



October 19, 2001

State of Utah  
Division of Oil, Gas & Mining  
Attn: Brad Hill  
1594 West North Temple - Suite 1210  
P.O. Box 145801  
Salt Lake City, Utah 84114-5801

RE: Applications for Permit to Drill: 1A-2-9-16, 2-2-9-16, 4-2-9-16, and  
6-2-9-16.

Dear Brad:

Enclosed find APD's on the above referenced wells. If you have any questions, feel free to give either Brad or myself a call.

Sincerely,

Mandie Crozier  
Permit Clerk

mc  
enclosures

cc: Bureau of Land Management  
Well File

**RECEIVED**

OCT 23 2001

**DIVISION OF  
OIL, GAS AND MINING**



STATE OF UTAH  
DIVISION OF OIL, GAS AND MINING

## APPLICATION FOR PERMIT TO DRILL, DEEPEN

1a. TYPE OF WORK <b>DRILL</b> <input checked="" type="checkbox"/> <b>DEEPEN</b> <input type="checkbox"/>		5. LEASE DESIGNATION AND SERIAL NO. <b>U-16535 ML-21839</b>
1b. TYPE OF WELL		6. IF INDIAN, ALLOTTEE OR TRIBE NAME <b>N/A</b>
OIL <input checked="" type="checkbox"/> GAS <input type="checkbox"/> OTHER <input type="checkbox"/>		7. UNIT AGREEMENT NAME <b>N/A</b>
SINGLE <input type="checkbox"/> MULTIPLE <input checked="" type="checkbox"/>		8. FARM OR LEASE NAME <b>Monument Butte Gr "D"</b>
2. NAME OF OPERATOR <b>Inland Production Company</b>		9. WELL NO. <b>2-2-9-16</b>
3. ADDRESS AND TELEPHONE NUMBER: <b>Route #3 Box 3630, Myton, UT 84052     Phone: (435) 646-3721</b>		10. FIELD AND POOL OR WILDCAT <b>Monument Butte</b>
4. LOCATION OF WELL (FOOTAGE) At Surface <b>Lot #2     1980' FEL 660' FNL</b> <i>4435201 H</i> At proposed Producing Zone <i>592159 E</i>		11. QTR/QTR. SECTION, TOWNSHIP, RANGE, MERIDIAN: <b>Lot #2     NWNE</b> <b>Sec. 2, T9S, R16E</b>
14. DISTANCE IN MILES AND DIRECTION FROM NEAREST TOWN OR POST OFFICE* <b>Approximately 11.8 Miles southwest of Myton, UT</b>		12. County     13. STATE <b>Duchesne     UT</b>
15. DISTANCE FROM PROPOSED* LOCATION TO NEAREST PROPERTY OR LEASE LINE, FT. (Also to nearest drlg. unit line, if any) <b>Approx 728' f/lse line &amp; 728' f/unit line</b>	16. NO. OF ACRES IN LEASE <b>920</b>	17. NO. OF ACRES ASSIGNED TO THIS WELL <b>40</b>
18. DISTANCE FROM PROPOSED LOCATION* TO NEAREST WELL. DRILLING, COMPLETED, OR APPLIED FOR ON THIS LEASE, FT. <b>Approximately 1306'</b>	19. PROPOSED DEPTH <b>6500'</b>	20. ROTARY OR CABLE TOOLS <b>Rotary</b>
21. ELEVATIONS (Show whether DF, RT, GR, etc.) <b>5475' GR</b>		22. APPROX. DATE WORK WILL START* <b>4th Quarter 2001</b>

### 23. PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	SIZE OF CASING	WEIGHT/FOOT	SETTING DEPTH	QUANTITY OF CEMENT
12 1/4	8 5/8	24#	290'	155 sx +/- 10%
7 7/8	5 1/2	15.5#	TD	275 sx lead followed by 450 sx tail
				See Detail Below

DESCRIBE PROPOSED PROGRAM: If proposal is to deepen, give date on present productive zone and proposed new productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any.

\*The actual cement volumes will be calculated off of the open hole logs, plus 15% excess:

**SURFACE PIPE** - 155 sx Class G Cement +/- 10%, w/ 2% CaCl<sub>2</sub> & 1/4#/sk Cello-flake  
 Weight: 15.8 PPG     YIELD: 1.17 Cu Ft/sk     H<sub>2</sub>O Req: 5 gal/sk

**LONG STRING** - Lead: Premium Lite II Cement + 3lbs/sk BA-90 + 3% KCl + .25 lbs/sk Cello Flake + 2 lbs/sk Kol Seal + 10% Bentonite + .5% Sodium Metasilicate  
 Weight: 11.0 PPG     YIELD: 3.43 Cu Ft/sk     H<sub>2</sub>O Req: 21.04 gal/sk

Tail: 50-50 Poz-Class G Cement + 3% KCl + .25 lbs/sk Cello Flake + 2% Bentonite + .3% Sodium Metasilicate  
 Weight: 14.2 PPG     YIELD: 1.59 Cu Ft/sk     H<sub>2</sub>O Req: 7.88 gal/sk

24. Name & Signature Mandie Crozier Title: Permit Clerk Date: 10/19/01  
**Mandie Crozier**

(This space for State use only)

API Number Assigned: 43-013-32314

APPROVAL:

**Approved by the  
Utah Division of  
Oil, Gas and Mining**

Date: 12-03-01

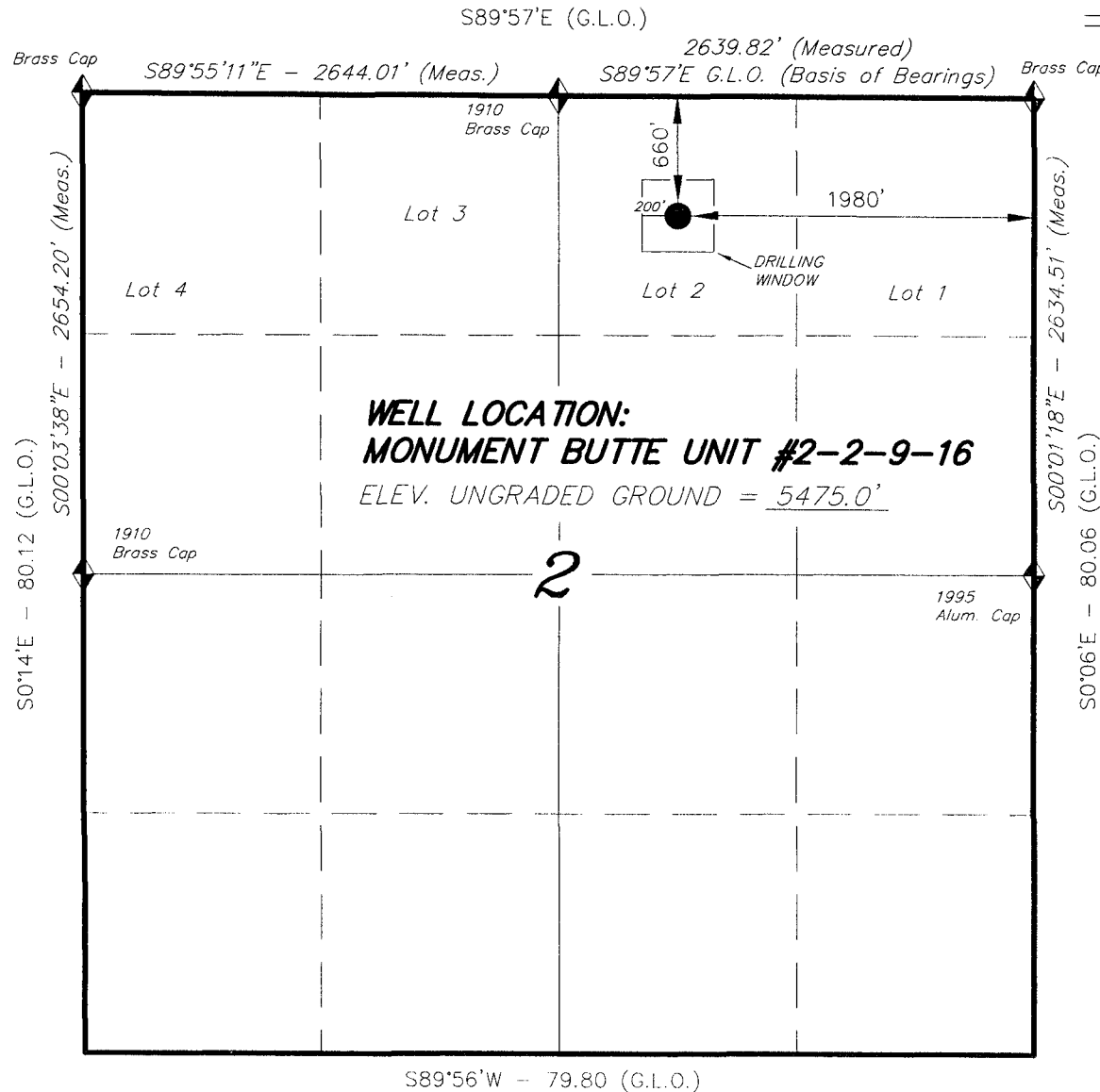
By: [Signature]



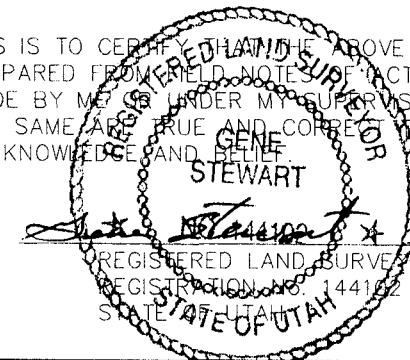
**T9S, R16E, S.L.B.&M.**

**INLAND PRODUCTION COMPANY**

WELL LOCATION, MONUMENT BUTTE UNIT  
#2-2-9-16, LOCATED AS SHOWN IN  
LOT 2 OF SECTION 2, T9S, R16E,  
S.L.B.&M. DUCHESNE COUNTY, UTAH.



THIS IS TO CERTIFY THAT THE ABOVE PLAT WAS  
PREPARED FROM FIELD NOTES OF ACTUAL SURVEYS  
MADE BY ME OR UNDER MY SUPERVISION AND THAT  
THE SAME ARE TRUE AND CORRECT TO THE BEST OF  
MY KNOWLEDGE AND BELIEF.



= SECTION CORNERS LOCATED

BASIS OF ELEV; U.S.G.S. 7-1/2 min QUAD (MYTON SE)

**TRI STATE LAND SURVEYING & CONSULTING**

38 WEST 100 NORTH - VERNAL, UTAH 84078

(435) 781-2501

SCALE: 1" = 1000'	SURVEYED BY: G.S. D.J.S.
DATE: 10-3-01	DRAWN BY: J.R.S.
NOTES:	FILE #



United States Department of the Interior

BUREAU OF LAND MANAGEMENT  
Utah State Office  
P.O. Box 45155  
Salt Lake City, Utah 84145-0155

IN REPLY REFER TO:  
3160  
(UT-922)

October 23, 2001

Memorandum

To: Assistant District Manager Minerals, Vernal District

From: Michael Coulthard, Petroleum Engineer

Subject: 2001 Plan of Development Monument Butte Unit Duchesne  
County, Utah.

Pursuant to email between Lisha Cordova, Division of Oil, Gas and Mining, and Mickey Coulthard, Utah State Office, Bureau of Land Management. The following wells are planned for calendar year 2001 within the Monument Butte Unit, Duchesne County, Utah.

API #	WELL NAME	LOCATION
(Proposed PZ Green River)		
43-013-32313	Mon Butte 1A-2-9-16	Sec. 2, T9S, R16E 0714 FNL 0728 FEL
43-013-32314	Mon Butte 2-2-9-16	Sec. 2, T9S, R16E 0660 FNL 1980 FEL
43-013-32315	Mon Butte 4-2-9-16	Sec. 2, T9S, R16E 0587 FNL 0640 FWL
43-013-32316	Mon Butte 6-2-9-16	Sec. 2, T9S, R16E 1852 FNL 1960 FWL

This office has no objection to permitting the wells at this time.

/s/ Michael L. Coulthard

bcc: File - Monument Butte Unit  
Division of Oil Gas and Mining  
Agr. Sec. Chron  
Fluid Chron

MCoulthard:mc:10-23-1



INLAND PRODUCTION COMPANY  
MONUMENT BUTTE UNIT 2-2-9-16  
LOT #2 SECTION 2, T9S, R16E  
DUCHESNE COUNTY, UTAH

TEN POINT DRILLING PROGRAM

1. **GEOLOGIC SURFACE FORMATION:**

Uinta formation of Upper Eocene Age

2. **ESTIMATED TOPS OF IMPORTANT GEOLOGIC MARKERS:**

Uinta	0 – 1700'
Green River	1700'
Wasatch	6500'

3. **ESTIMATED DEPTHS OF ANTICIPATED WATER, OIL, GAS OR MINERALS:**

Green River Formation 1700' – 6500' – Oil

4. **PROPOSED CASING PROGRAM:**

Surface Casing: 8-5/8" J-55 24# w/ST&C collars; set at 290' (New)  
Production Casing: 5-1/2" J-55, 15.5# w/LT&C collars; set at TD (New or used, inspected).

5. **MINIMUM SPECIFICATIONS FOR PRESSURE CONTROL:**

The operator's minimum specifications for pressure control equipment are as follows:

An 8" Series 900 Annular Bag type BOP and an 8" Double Ram Hydraulic unit with a closing unit will be utilized. Function test of BOP's will be check daily.

Refer to **Exhibit C** for a diagram of BOP equipment that will be used on this well.

6. **TYPE AND CHARACTERISTICS OF THE PROPOSED CIRCULATION MUDS:**

The well will be drilled with air mist system to 3200', then from 3200' +/- to TD a fresh water/polymer system will be utilized. If necessary, to control formation fluids, the system will be weighted with the addition of bentonite gel, and if conditions warrant, barite. This fresh water system typically will contain Total Dissolved Solids (TDS) of less than 3000 PPM. Neither potassium chloride nor chromates will be utilized in the fluid system. The anticipated mud weight is 8.4 ppg and weighted as necessary for gas control.

**AIR DRILLING**

In the event that the proposed location is to be "Air Drilled", Inland requests a variance to regulations requiring a straight run blooie line. Inland proposes that the flowline will contain two (2) 90-degree turns. Inland also requests a variance to regulations requiring an automatic igniter or continuous pilot light on the blooie line. Inland requests authorization to ignite as needed, and the flowline at 80'.

Inland Production Company requests that the spark arrest, exhaust, or water cooled exhaust be waived under the Special Drilling Operations of Onshore Order #2.



**MUD PROGRAM**

Surface – 3200’  
3200’ – TD’

**MUD TYPE**

fresh water or air/mist system  
fresh water system

From surface to  $\pm$  3200 feet will be drilled with either fresh water or an air/mist system, depending on the drilling contractor's preference. From about 3200 feet, or in the case of the air/mist system when hole conditions dictate, to TD, a fresh water system will be utilized. Clay inhibition and hole stability will be achieved with a KCL substitute additive. This fresh water system will typically contain Total Dissolved Solids (TDS) of less than 3000 PPM. Anticipated mud weight is 8.4 lbs/gal. If necessary to control formation fluids or pressure, the system will be weighted with the addition of bentonite gel, and if pressure conditions warrant, with barite. No chromate additives will be used in the mud system.

7. **AUXILIARY SAFETY EQUIPMENT TO BE USED:**

Auxiliary safety equipment will be a Kelly Cock, bit float, and a TIW valve with drill pipe threads.

8. **TESTING, LOGGING AND CORING PROGRAMS:**

The logging program will consist of a Dual Induction, Gamma Ray and Caliper log from TD to base of surface casing @ 290’ +/-, and a Compensated Neutron-Formation Density Log from TD to 3500’ +/- . A cement bond log will be run from PBTD to cement top. No drill stem testing or coring is planned for this well.

9. **ANTICIPATED ABNORMAL PRESSURE OR TEMPERATURE:**

The anticipated maximum bottom hole pressure is 2000 psi. It is not anticipated that abnormal temperatures will be encountered; or that any other abnormal hazards such as H2S will be encountered in this area.

10. **ANTICIPATED STARTING DATE AND DURATION OF THE OPERATIONS:**

It is anticipated that the drilling operations will commence the fourth quarter of 2001, and take approximately seven (7) days from spud to rig release.



INLAND PRODUCTION COMPANY  
MONUMENT BUTTE UNIT 2-2-9-16  
LOT #2 SECTION 2, T9S, R16E  
DUCHESNE COUNTY, UTAH

THIRTEEN POINT SURFACE PROGRAM

1. **EXISTING ROADS**

See attached **Topographic Map "A"**

To reach Inland Production Company well location site Monument Butte Unit 2-2-9-16 located in the Lot #2 Section 2, T9S, R16E, S.L.B. & M., Duchesne County, Utah:

Proceed in a southwesterly direction out of Myton, Utah along Highway 40 approximately 1.6  $\pm$  miles to the junction of this highway and Utah State Highway 53; proceed southerly along Utah State Highway 53 approximately 5.2 miles  $\pm$  to its junction with an existing road to the southwest; proceed southwesterly approximately 2.9 miles  $\pm$  to its junction with an existing road to the south; proceed southeasterly approximately 1.8 miles  $\pm$  to its junction with an existing road to the east; proceed northeasterly approximately 0.2 miles  $\pm$  to its junction with the beginning of the proposed access road to the proposed 1A-2; proceed past the proposed well location of the 1A-2 approximately 110'  $\pm$  to the beginning of the proposed access road to the proposed 2-2-9-16; proceed along the proposed access road approximately 990'  $\pm$  to the proposed well location.

The highways mentioned in the foregoing paragraph are bituminous surfaced roads to the point where Highway 216 exists to the South, thereafter the roads are constructed with existing materials and gravel. The highways are maintained by Utah State road crews. All other roads are maintained by County crews.

The aforementioned dirt oil field service roads and other roads in the vicinity are constructed out of existing native materials that are prevalent to the existing area they are located in and range from clays to a sandy-clay shale material.

The roads for access during the drilling, completion and production phase will be maintained at the standards required by the State of Utah, or other controlling agencies. This maintenance will consist of some minor grader work for smoothing road surfaces and for snow removal.

2. **PLANNED ACCESS ROAD**

Approximately 990' of access road is proposed. See attached **Topographic Map "B"**.

The proposed access road will be an 18' crown road (9' either side of the centerline) with drainage ditches along either side of the proposed road whether it is deemed necessary in order to handle any run-off from normal meteorological conditions that are prevalent to this area. The maximum grade will be less than 8%.

There will be no culverts required along this access road. There will be barrow ditches and turnouts as needed along this road.

There are no fences encountered along this proposed road. There will be no new gates or cattle guards required.



All construction material for this access road will be borrowed material accumulated during construction of the access road.

3. **LOCATION OF EXISTING WELLS**

Refer to **EXHIBIT B**.

4. **LOCATION OF EXISTING AND/OR PROPOSED FACILITIES**

There are no existing facilities that will be used by this well.

It is anticipated that this well will be a producing oil well.

Upon construction of a tank battery, the well pad will be surrounded by a dike of sufficient capacity to contain at minimum 110% of the largest tank volume within the facility battery.

Tank batteries will be built to State specifications.

All permanent (on site for six (6) months or longer) structures, constructed or installed (including pumping units), will be painted Desert Tan. All facilities will be painted within six months of installation.

5. **LOCATION AND TYPE OF WATER SUPPLY**

Fresh water purchased from the Johnson Water District will be used for drilling. A temporary poly pipeline may be used for water transportation from our existing supply line from Johnson Water District, or trucked from Inland Production Company's injection facilities – **EXHIBIT A**.

There will be no water well drilled at this site.

6. **SOURCE OF CONSTRUCTION MATERIALS**

All construction material for this location shall be borrowed material accumulated during construction of the location site and access road.

A mineral material application is not required for this location.

7. **METHODS FOR HANDLING WASTE DISPOSAL**

A small reserve pit (90' x 40' x 8' deep, or less) will be constructed from native soil and clay materials. The reserve pit will receive the processed drill cutting (wet sand, shale & rock) removed from the wellbore. Any drilling fluids, which do accumulate in the pit as a result of shale-shaker carryover, cleaning of the sand trap, etc., will be promptly reclaimed. All drilling fluids will be fresh water based, typically containing Total Dissolved Solids of less than 3000 PPM. No potassium chloride, chromates, trash, debris, nor any other substance deemed hazardous will be placed in this pit. Therefore, it is proposed that no synthetic liner be required in the reserve pit. However, if upon constructing the pit there is insufficient fine clay and silt present, a liner will be used for the purpose of reducing water loss through percolation.

A portable toilet will be provided for human waste.

A trash basket will be provided for garbage (trash) and hauled away to an approved disposal site at the completion of the drilling activities.



Immediately upon first production, all produced water will be confined in storage tanks. Inland requests temporary approval to transfer the produced water to Inland's nearby waterflood, for re-injection into the waterflood reservoirs via existing approved injection wells. Within 90 days of first production, a water analysis will be submitted to the Authorized Officer along with an application for approval of this, as a permanent disposal method.

8. **ANCILLARY FACILITIES:**

There are no ancillary facilities planned for at the present time and none foreseen in the near future.

9. **WELL SITE LAYOUT:**

See attached Location Layout Sheet.

**Fencing Requirements**

All pits will be fenced according to the following minimum standards:

- a) A 39-inch net wire shall be used with at least one strand of barbed wire on top of the net.
- b) The net wire shall be no more than two (2) inches above the ground. The barbed wire shall be three (3) inches above the net wire. Total height of the fence shall be at least forty-two (42) inches.
- c) Corner posts shall be centered and/or braced in such a manner to keep tight at all times
- d) Standard steel, wood or pipe posts shall be used between the corner braces. Maximum distance between any two posts shall be no greater than sixteen (16) feet.
- e) All wire shall be stretched, by using a stretching device, before it is attached to the corner posts.

The reserve pit fencing will be on three (3) sides during drilling operations and on the fourth side when the rig moves off location. Pits will be fenced and maintained until cleanup.

10. **PLANS FOR RESTORATION OF SURFACE:**

a) **Producing Location**

Immediately upon well completion, the location and surrounding area will be cleared of all unused tubing, equipment, debris, material, trash and junk not required for production.

The reserve pit and that portion of the location not needed for production facilities/operations will be recontoured to the approximated natural contours. Weather permitting, the reserve pit will be reclaimed within one hundred twenty (120) days from the date of well completion. Before any dirt work takes place, the reserve pit must have all fluids and hydrocarbons removed.

b) **Dry Hole Abandoned Location**



At such time as the well is plugged and abandoned, the operator shall submit a subsequent report of abandonment and the State of Utah will attach the appropriate surface rehabilitation conditions of approval.

11. **SURFACE OWNERSHIP:** State of Utah

12. **OTHER ADDITIONAL INFORMATION:**

- a) Inland Production Company is responsible for informing all persons in the area who are associated with this project that they will be subject to prosecution for knowingly disturbing historic or archaeological sites, or for collecting artifacts. If historic or archaeological materials are uncovered during construction, Inland is to immediately stop work that might further disturb such materials and contact the Authorized Officer.
- b) Inland Production will control noxious weeds along rights-of-way for roads, pipelines, well sites or other applicable facilities. On State administered land it is required that a Pesticide Use Proposal shall be submitted and given approval prior to the application of herbicides or other possible hazardous chemicals.
- c) Drilling rigs and/or equipment used during drilling operations on this well site will not be stacked or stored on State Lands after the conclusion of drilling operations or at any other time without State authorization. However, if State authorization is obtained, it is only a temporary measure to allow time to make arrangements for permanent storage on commercial facilities.

**The Archaeological Cultural Resource Survey is attached.**

#### **Additional Surface Stipulations**

All lease and/or unit operations will be conducted in such a manner that full compliance is made with all applicable laws and regulations. Onshore Oil and Gas Orders, the approved plan of operations and any applicable Notice to Lessees. A copy of these conditions will be furnished to the field representative to ensure compliance.

#### **Hazardous Material Declaration**

Inland Production Company guarantees that during the drilling and completion of the Monument Butte Unit 2-2-9-16, Inland will not use, produce, store, transport or dispose 10,000# annually of any of the hazardous chemicals contained in the Environmental Protection Agency's consolidated list of chemicals subject to reporting under Title III Superfund Amendments and Reauthorization Act (SARA) of 1986. Inland also guarantees that during the drilling and completion of the Monument Butte Unit 2-2-9-16 Inland will use, produce, store, transport or dispose less than the threshold planning quantity (T.P.Q.) of any extremely hazardous substances as defined in 40 CFR 355.

A complete copy of the approved APD, if applicable, shall be on location during the construction of the location and drilling activities.

Inland Production Company or a contractor employed by Inland Production shall contact the State office at (801) 722-3417, 48 hours prior to construction activities.

The State office shall be notified upon site completion prior to moving on the drilling rig.



13. **LESSEE'S OR OPERATOR'S REPRESENTATIVE AND CERTIFICATION:**

Representative

Name: Brad Mecham  
Address: Inland Production Company  
Route 3, Box 3630  
Myton, UT 84052  
Telephone: (435) 646-3721

Certification

Please be advised that INLAND RESOURCES, INC. is considered to be the operator of well #2-2-9-16, Lot #2 Section 2, T9S, R16E, LEASE #U-16535, Duchesne County, Utah and is responsible under the terms and conditions of the lease for the operations conducted upon the leased lands. Bond coverage is provided by Hartford Accident #4471291. ~~4487744~~ *OK-JC* *sc*

I hereby certify that the proposed drill site and access route have been inspected, and I am familiar with the conditions which currently exist: that the statements made in this plan are true and correct to the best of my knowledge; and that the work associated with the operations proposed here will be performed by Inland Resources, Inc. and its contractors and subcontractors in conformity with this plan and the terms and conditions under which it is approved. This statement is subject to the provisions of the 18 U.S.C. 1001 for the filing of a false statement.

10/19/01  
Date

Mandie Crozier  
Mandie Crozier  
Permit Clerk  
Inland Production Company



# INLAND PRODUCTION COMPANY

MONUMENT BUTTE UNIT #2-2-9-16

SEC. 2, T9S, R16E, S.L.B.&M.

PROPOSED ACCESS  
ROAD (Max. 6% Grade)

F/1.2

Toe of  
Fill Slope

F/4.9

F/3.2

WASTE  
MATERIAL

Existing 2" Surface  
Plastic Pipeline

2' Berm Around  
Fill Portion of Location

STA. 2+07

Existing  
Drainage

F/0.1

C/1.7

C/4.0

STA. 1+45

C/0.1

Top of  
Cut Slope

WELL HEAD:  
UNGRADED = 5475.0'  
FIN. GRADE = 5474.9'

C/2.4

C/4.8

PIT TOPSOIL  
STOCKPILE

ROUND CORNER TO  
AVOID EXCESS CUT

ROUND CORNER TO  
AVOID EXCESS CUT

TOPSOIL  
STOCKPILE

STA. 0+00

C/10.4

C/3.8

C/5.3

CONSTRUCT DIVERSION  
DITCH

CONSTRUCT DIVERSION DAM

## REFERENCE POINTS

145' NORTH = 5479.5'  
175' NORTH = 5482.6'  
180' WEST = 5480.3'  
205' WEST = 5480.3'

SURVEYED BY: G.S.

SCALE: 1" = 50'

DRAWN BY: J.R.S.

DATE: 10-3-01

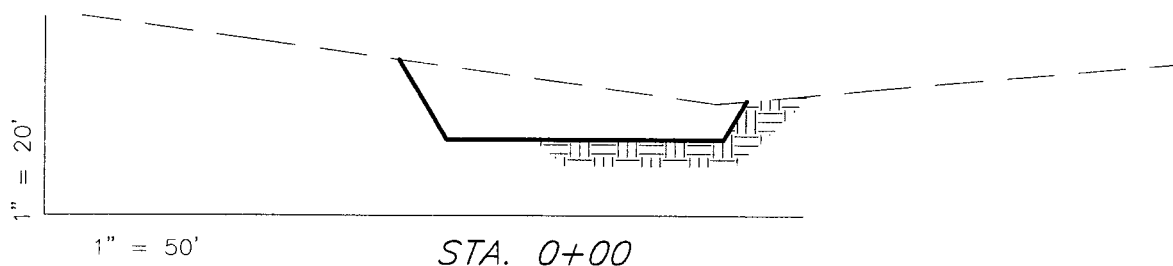
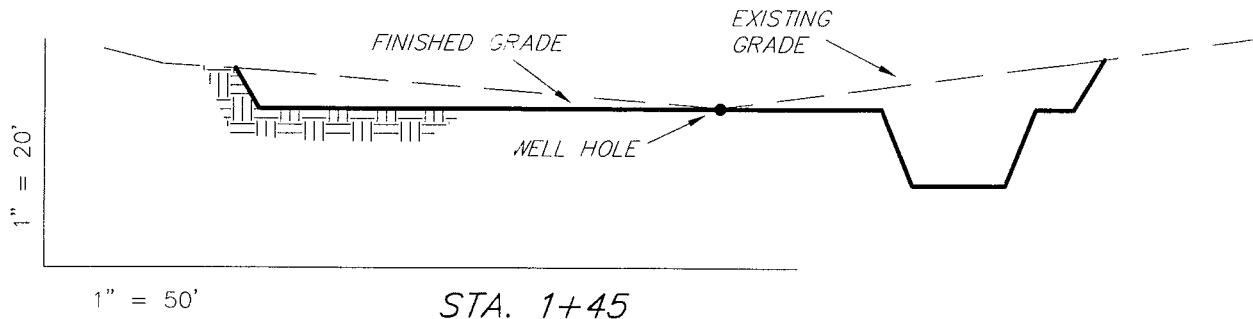
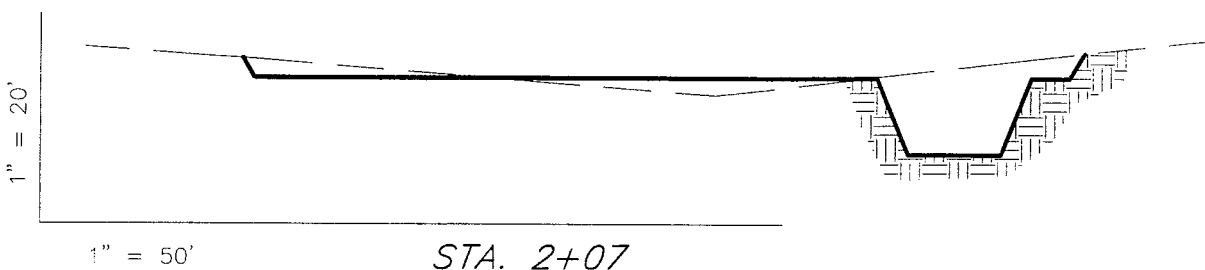
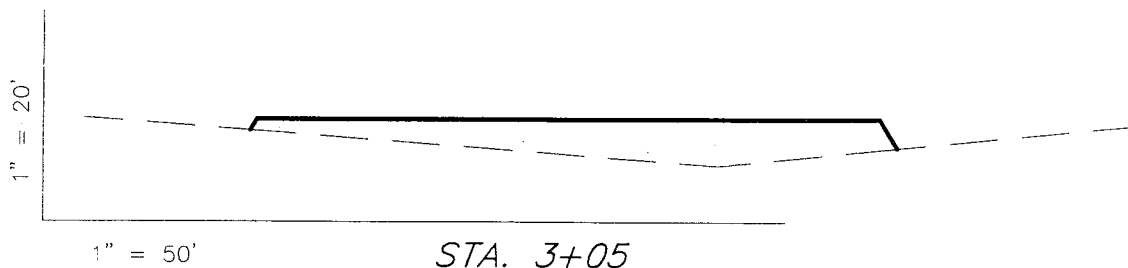
Tri State  
Land Surveying, Inc.

(435) 781-2501

38 WEST 100 NORTH VERNAL, UTAH 84078



*INLAND PRODUCTION COMPANY*  
*CROSS SECTIONS*  
*MONUMENT BUTTE UNIT #2-2-9-16*



**APPROXIMATE YARDAGES**

CUT = 3,960 Cu. Yds.

FILL = 1,510 Cu. Yds.

PIT = 640 Cu. Yds.

6" TOPSOIL = 1,010 Cu. Yds.

SURVEYED BY: G.S.

SCALE: 1" = 50'

DRAWN BY: J.R.S.

DATE: 10-3-01

*Tri State*  
*Land Surveying, Inc.*  
 38 WEST 100 NORTH VERNAL, UTAH 84078  
 (435) 781-2501

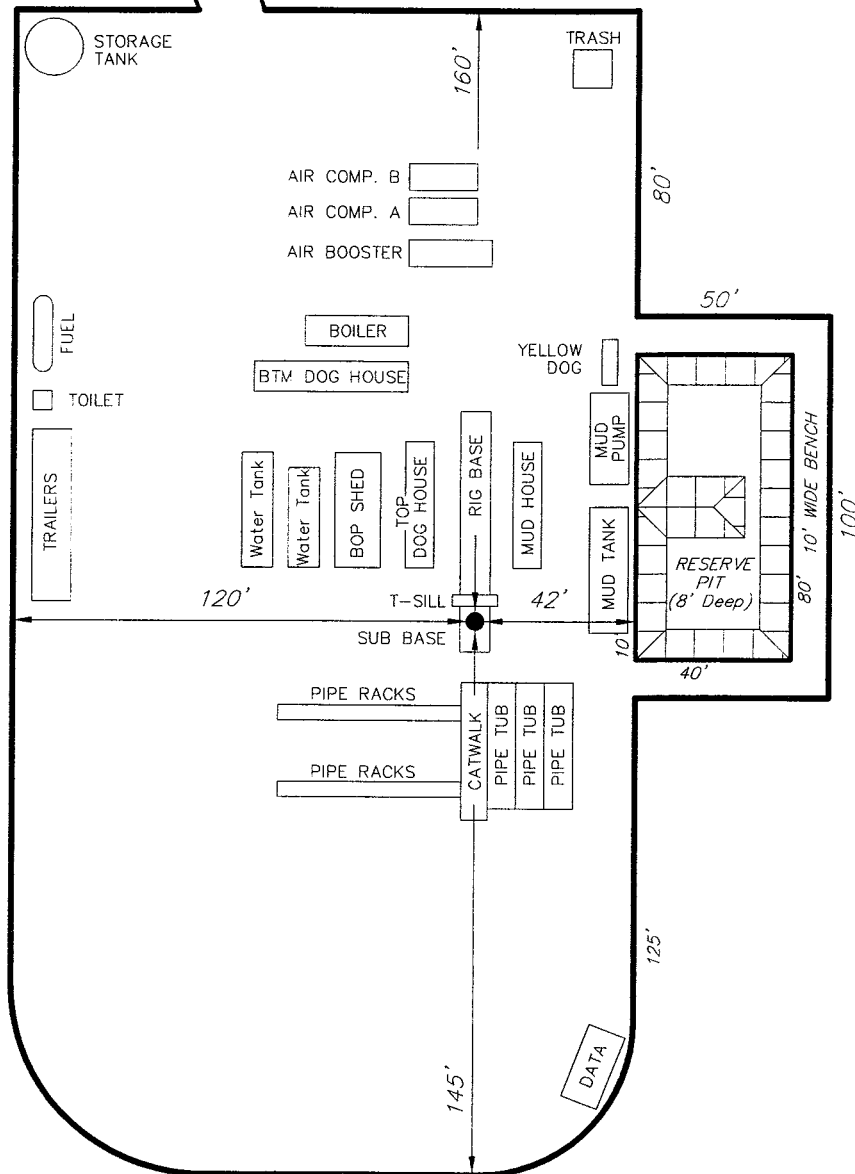


# INLAND PRODUCTION COMPANY

## TYPICAL RIG LAYOUT

### MONUMENT BUTTE UNIT #2-2-9-16

PROPOSED ACCESS  
ROAD (Max. 6% Grade)



SURVEYED BY: G.S.

SCALE: 1" = 50'

DRAWN BY: J.R.S.

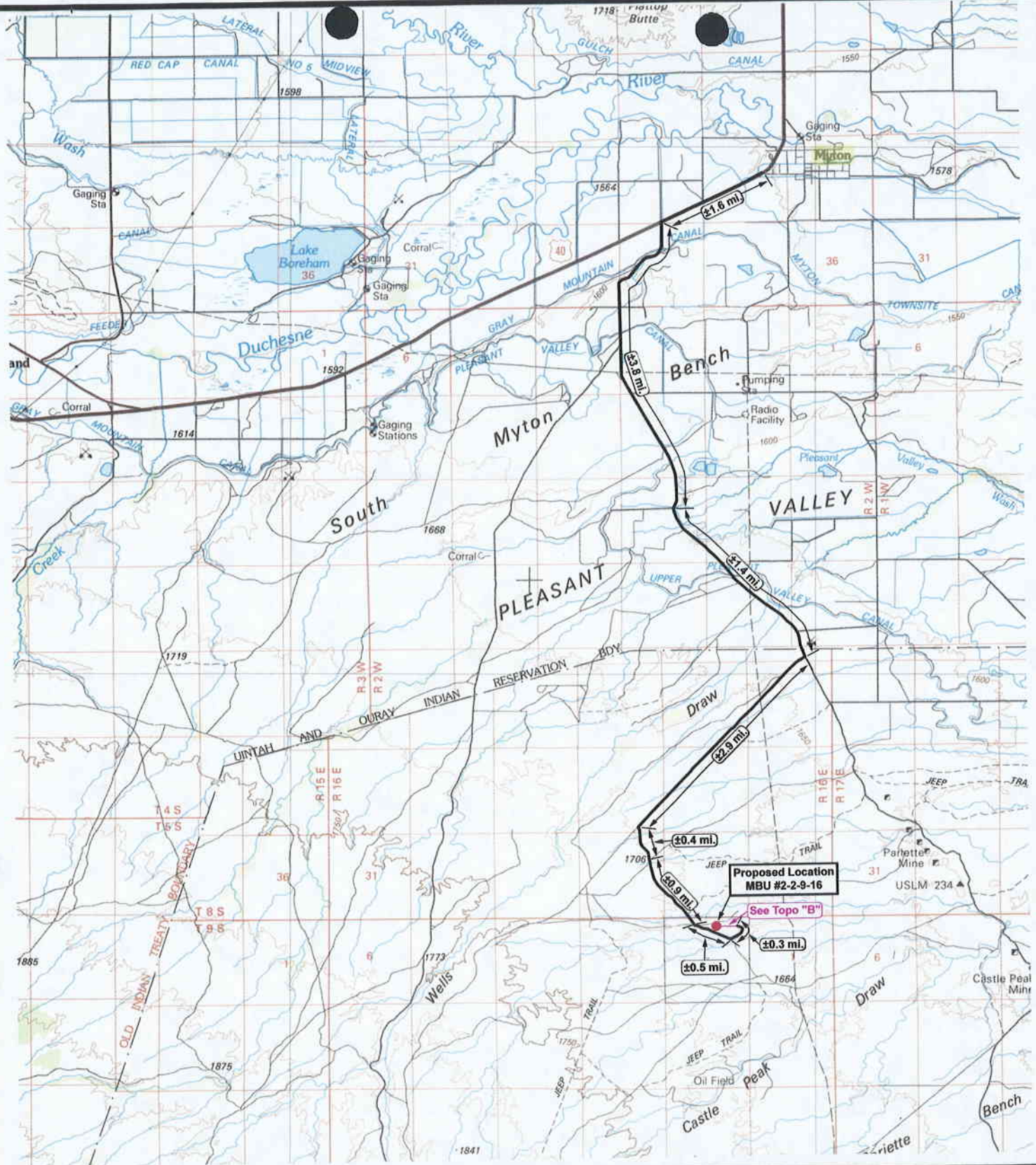
DATE: 10-3-01

**Tri State**  
Land Surveying, Inc.

(435) 781-2501

38 WEST 100 NORTH VERNAL, UTAH 84078





**Monument Butte Unit #2-2-9-16  
SEC. 2, T9S, R16E, S.L.B.&M**



**Tri-State  
Land Surveying Inc.**  
(435) 781-2501  
38 West 100 North Vernal, Utah 84078

SCALE: 1" = 100,000'  
DRAWN BY: D.J.  
DATE: 10-04-2001

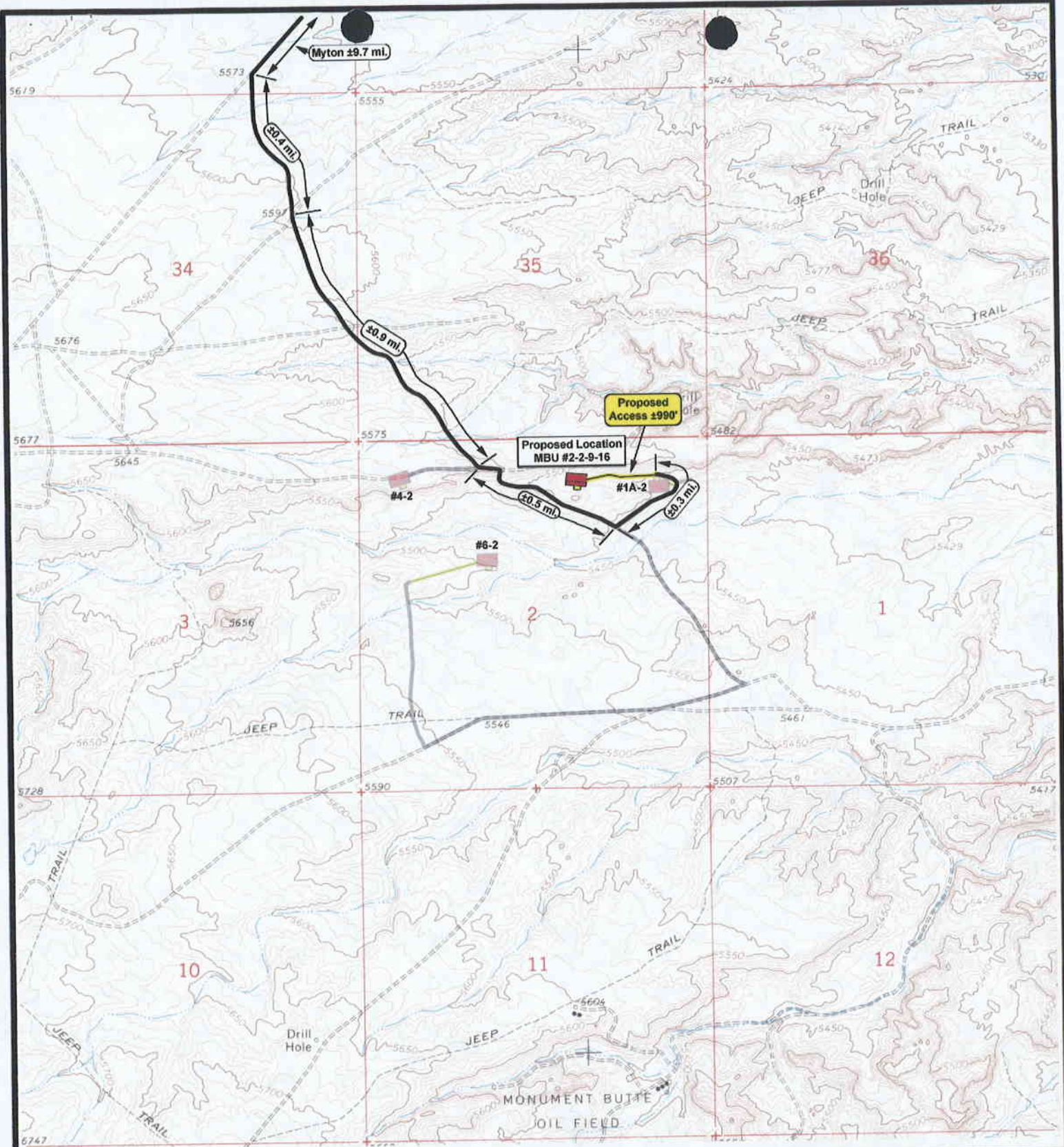
**Legend**

- Existing Road
- Proposed Access

TOPOGRAPHIC MAP

**"A"**





**Monument Butte Unit #2-2-9-16**  
**SEC. 2, T9S, R16E, S.L.B.&M.**



**Tri-State**  
*Land Surveying Inc.*  
 (435) 781-2501  
 38 West 100 North Vernal, Utah 84078

SCALE: 1" = 2000'  
 DRAWN BY: D.J.  
 DATE: 10-03-2001

**Legend**

Existing Road

Proposed Access

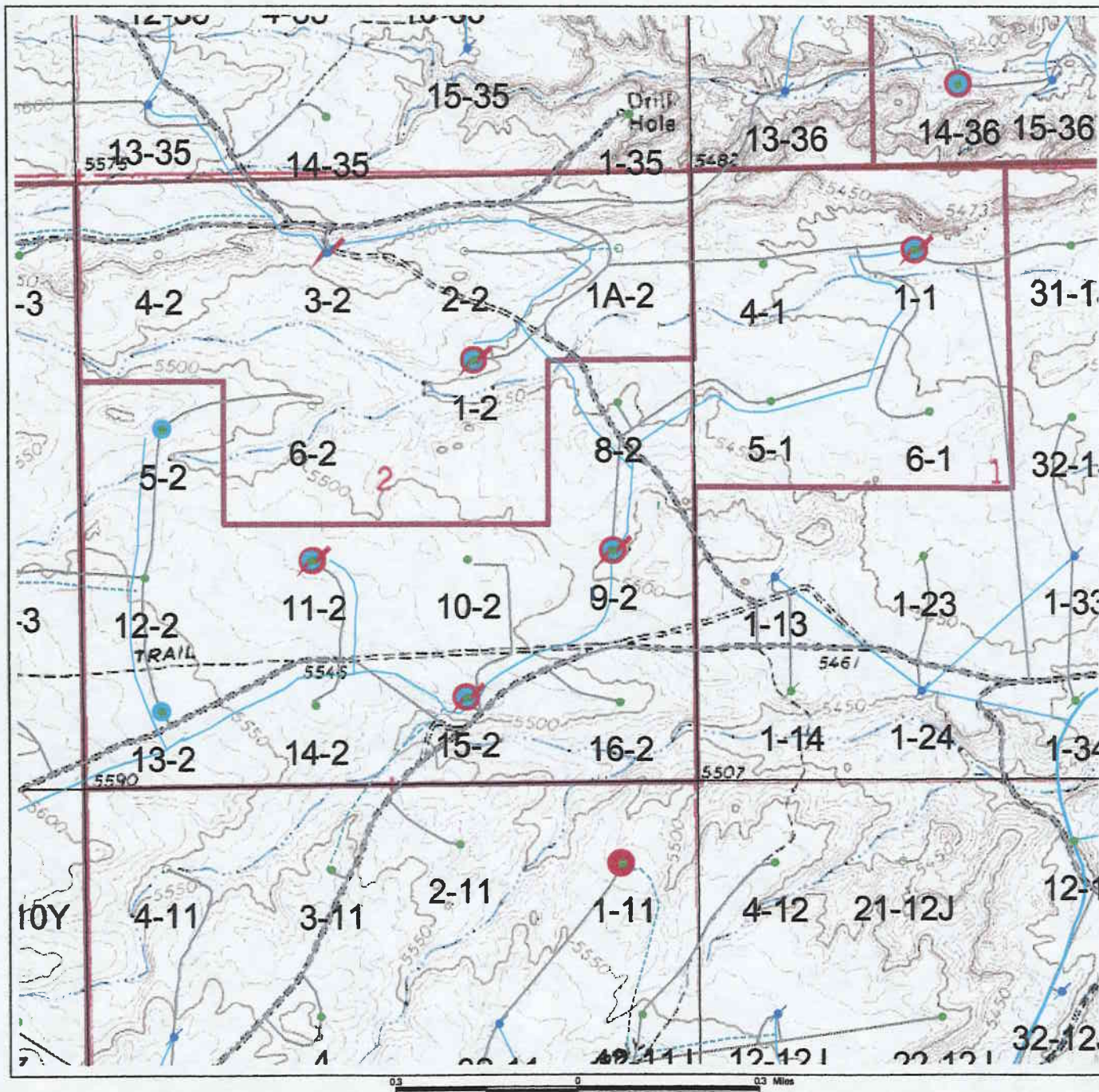
TOPOGRAPHIC MAP

**"B"**









Water Taps

2001 Injection Conversion Program

Pending Waterline ROW

Approved Waterline ROW

Approved Water Injection Permit

Water Injection Permit Pending

Johnson Water Line  
Water 6 inch  
Water 4 inch  
Water 4 inch - High Pressure  
Water 4 inch Poly  
Water 2 to 3 inch  
Proposed Water

Pump Stations

Roads (Digitized)

Paved

Dirt

Proposed

Two Track

Private

Participating Area 'A'

Unit Sections

Existing Units

Proposed Units

N



419 17th Street Suite 700  
Denver, Colorado 80202  
Phone: (303) 995-0102

## Water Pipeline Map

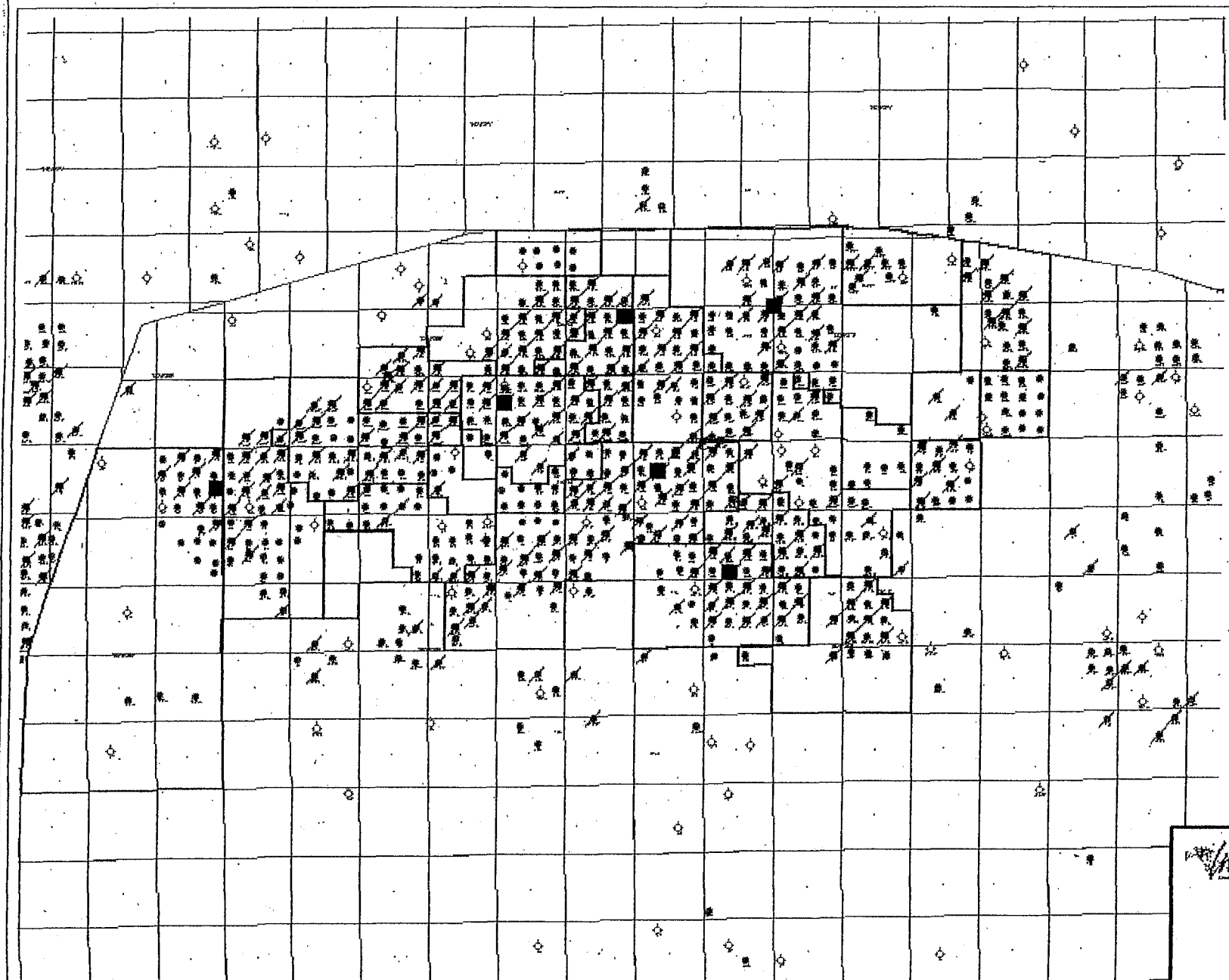
UINTA BASIN, UTAH

Duchesne & Uintah Counties, Utah

D.C. Ogden

October 17, 2001

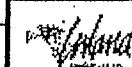




- Section Shaded
- Well Categories
- ★ OIL
  - ◇ DRY
  - ↘ SHUTIN
  - Wells



Exhibit "A"



430 17th Street, Suite 700  
Denver, Colorado 80202  
Phone (303) 861-0123

Uinta Basin

UINTA BASIN, UTAH

Garfield & Chubb Counties, UT

Scale 1:50,000

U. S. Geol.

1 0 1 Miles







RAM TYPE B.O.P.

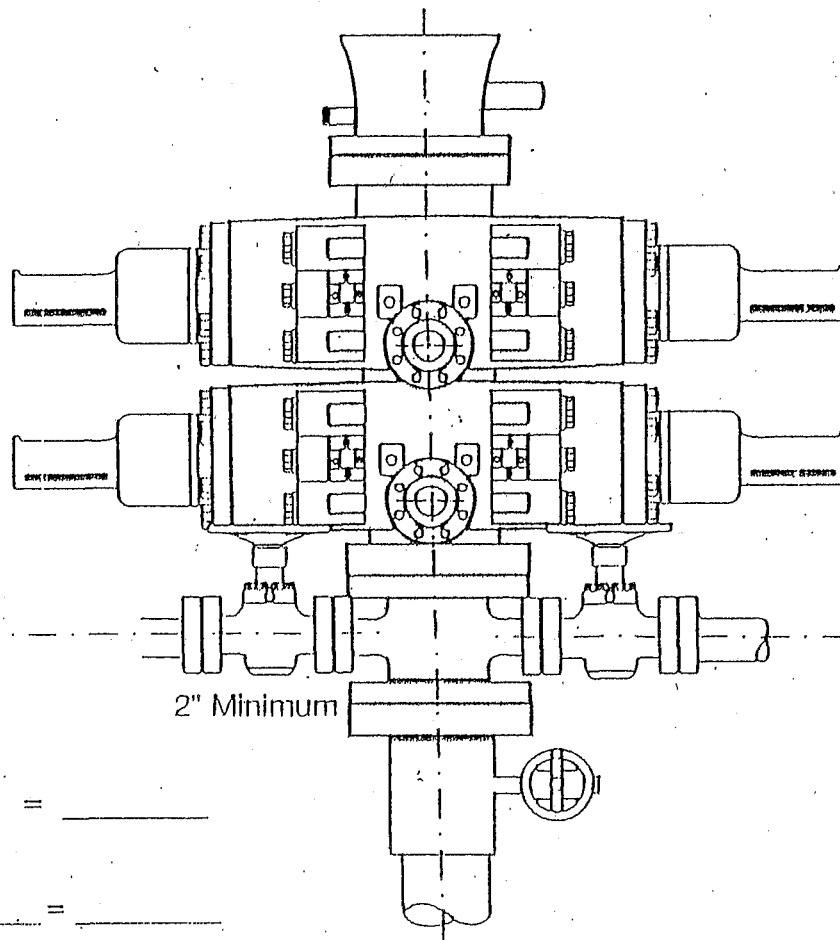
Make:

Size:

Model:

## 2-M SYSTEM

EXHIBIT "C"



GAL TO CLOSE

Annular BOP = \_\_\_\_\_

Ramtype BOP

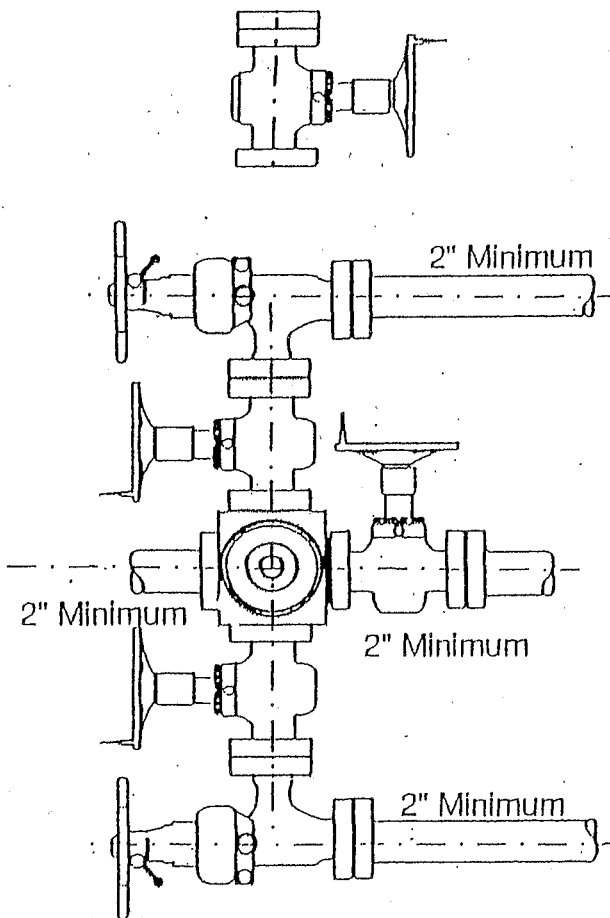
\_\_\_\_\_ Rams x \_\_\_\_\_ = \_\_\_\_\_

= \_\_\_\_\_ Gal.

\_\_\_\_\_ x 2 = \_\_\_\_\_ Total Gal.

Rounding off to the next higher  
increment of 10 gal. would require

\_\_\_\_\_ Gal. (total fluid & nitro volume)





# CULTURAL RESOURCE EVALUATION OF VARIOUS LARGE TRACTS IN THE WELLS DRAW TO PARIETTE BENCH LOCALITY IN DUCHESNE & UINTAH COUNTIES, UTAH

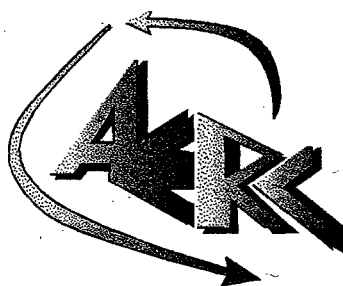
Report Prepared for Inland Resources, Inc.

Department of Interior Permit No.: UT-98-54937

Utah State Project No.: UT-98-AF-0164bs

AERC Project 1598 (IPC98-4)

Author of the Report:  
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July 21, 1998



## Abstract

A series of intensive cultural resource examinations has been conducted for Inland Resources, Inc. of seven project tracts situated in the Wells Draw to Pariette Bench locality of Duchesne and Uintah Counties, Utah. These parcels include portions of Sections 12 and 7 in the **Ashley Unit** (T. 9 S., R. 15 & 16 E.), portions of Sections 2, 3, 4, 9, and 10 in the **South Wells Draw Unit** (T. 9 S., R. 16 E.), portions of Sections 35 and 36 (T. 8 S., R. 17 E.) and 2 (T. 9 S., R. 17 E.) in the **Odekirk Springs Unit**, and portions of Sections 15, 18, and 22 in the **South Pleasant Valley Unit** (T. 9 S., R. 17 E.). The purpose of this report is to detail the result of these evaluations.

A total of 3,919 acres is incorporated into this report as examined for the presence of cultural resources preparatory to the development of Inland's well pads, access roads, and pipeline corridors in these project tracts. A total of 2,950 acres (75%) within the proposed development tracts is situated on federal lands administered by the Vernal District of the Bureau of Land Management, Diamond Mountain Resource Area, Vernal, Utah. The remaining 969 acres (25%) are situated on Utah State lands administrated by the Division of State School Trust Lands.

Field examinations were initially conducted in December 1997 and January 1998 and then again from mid-April through early June 1998. AERC archaeologists that participated on the project include Marcel Corbiel, Donna Daniels, Kris Kunkel, Alan Hutchinson, Stance Hurst, Christy Gobber, Richard Francisca, Tammy Gibson, Scott Edmisten, and Christopher Davies. The field survey program was conducted under the direction of Glade Hadden, and/or F.R. Hauck. This work was done under Utah project UT-98-AF-0164bs, which expires on December 31, 1998.

A total of 28 prehistoric sites (42DC 1149, 1150, 1155-1166, 1171, 1174-1177 and 42UN 2532-2538, 2552, 2566) and four isolated diagnostic artifacts (1598B/x1, 1598K/x2, 1598R/x1 & 1598R/x2) were identified and recorded during this project. Sites 42DC 1155, 1156, 1157, 1160, 1163, 1164, 1165, 1166, 1171, 1176, 1177 and 42UN 2532, 2533, 2534, 2536, and 2566 are considered non-significant cultural resources. Sites 42DC 1149, 1150, 1158, 1159, 1161, 1162, 1174, 1175 and 42UN 2535, 2537, 2538, and 2552 are considered significant cultural resource under criteria established for the documentation of National Register of Historic Places (36CFR60.6).

No previously recorded significant or National Register eligible cultural resources will be adversely affected by well location development and access/pipeline route corridor development within the acreage cleared and reported within this document with adherence to the recommendations provided in the final section of this report.



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## GENERAL INFORMATION

Between April 13 and June 9, 1998, a variety of AERC archaeologists including Kris Kunkel, Alan Hutchinson, Stance Hurst, Christy Gobber, Scott Edmisten, Richard Francisco, Patrick Walker, and Christopher G. Davies acting under the direction of Glade Hadden and/or F.R. Hauck, conducted intensive cultural resource evaluations of seven acreage tracts situated between the Wells Draw locality of Duchesne County on the West, and the Pariette Bench locality of Uintah County on the East, in the Uinta Basin region of eastern Utah (see Map 1). Cultural evaluations within these tracts actually began in the winter of 1997-97 as initially reported in Hauck and Hadden 1997.

These seven project tracts are actually associated with Inland Resource's **Ashley, South Wells Draw, Odekirk Springs, and South Pleasant Valley Units**. These tracts include portions of Sections 12 and 7 in the **Ashley Unit** (T. 9 S., R. 15 & 16 E.), portions of Sections 2, 3, 4, 9, and 10 in the **South Wells Draw Unit** (T. 9 S., R. 16 E.), portions of Sections 35 and 36 (T. 8 S., R. 17 E.) and 2 (T. 9 S., R. 17 E.) in the **Odekirk Springs Unit**, and portions of Sections 15, 18, and 22 in the **South Pleasant Valley Unit** (T. 9 S., R. 17 E.).

A total of 3,919 acres is incorporated into this report as examined for the presence of cultural resources preparatory to the development of Inland's well pads, access roads, and pipeline corridors in these project tracts. A total of 2950 acres (75%) within the proposed development tracts is situated on federal lands administered by the Vernal District of the Bureau of Land Management, Diamond Mountain Resource Area, Vernal, Utah. The remaining 969 acres (25%) are situated on Utah State lands administrated by the Division of State School Trust Lands.

The purpose of this field study and this report is to identify and document cultural site presence and assess National Register potential significance relative to established criteria (cf. Title 36 CFR 60.6). The future oil/gas development within these various tracts requires an archaeological evaluation in compliance with U.C.A. 9-8-404, the Federal Antiquities Act of 1906, the Reservoir Salvage Act of 1960-as amended, the National Environmental Policy Act of 1969, the Federal Land Policy and Management Act of 1979, the Archaeological Resources Protection Act of 1979, the Native American Religious Freedom Act of 1978, the Historic Preservation Act of 1980, and Executive Order 11593.

In addition to documenting cultural identity and significance, mitigation recommendations relative to the preservation of cultural data and materials can be directed to the Vernal District Office of the Bureau of Land Management, and to the Utah State Antiquities Section, Division of State History.

### Project Location

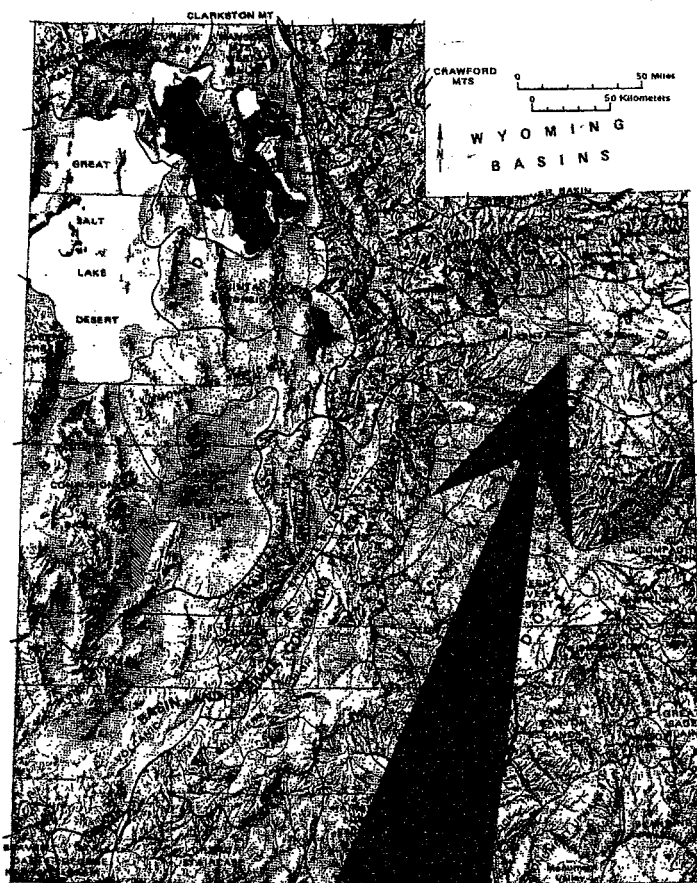
The project area extends from the Wells Draw locality of Duchesne County eastward to the Pariette Bench locality of Uintah County, Utah. The seven tracts under investigation are situated on



**MAP 1**  
**PROJECT AREA FOR THE**  
**INLAND RESOURCES 1998**  
**DEVELOPMENT PROGRAM**



**PROJECT:** IPC98-4  
**SCALE:** 1: 200,650  
**DATE:** 7/ 20/ 98



UTAH GEOLOGICAL  
 MAP  
 PHYSIOGRAPHIC

# PROJECT AREA

**TOWNSHIP:** multiple  
**RANGE:** multiple  
**MERIDIAN:** multiple

Utah Geological and Mineral Survey  
 Map 43 1977

Physiographic Subdivisions of Utah  
 by W.L. Stokes

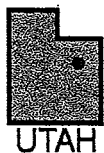
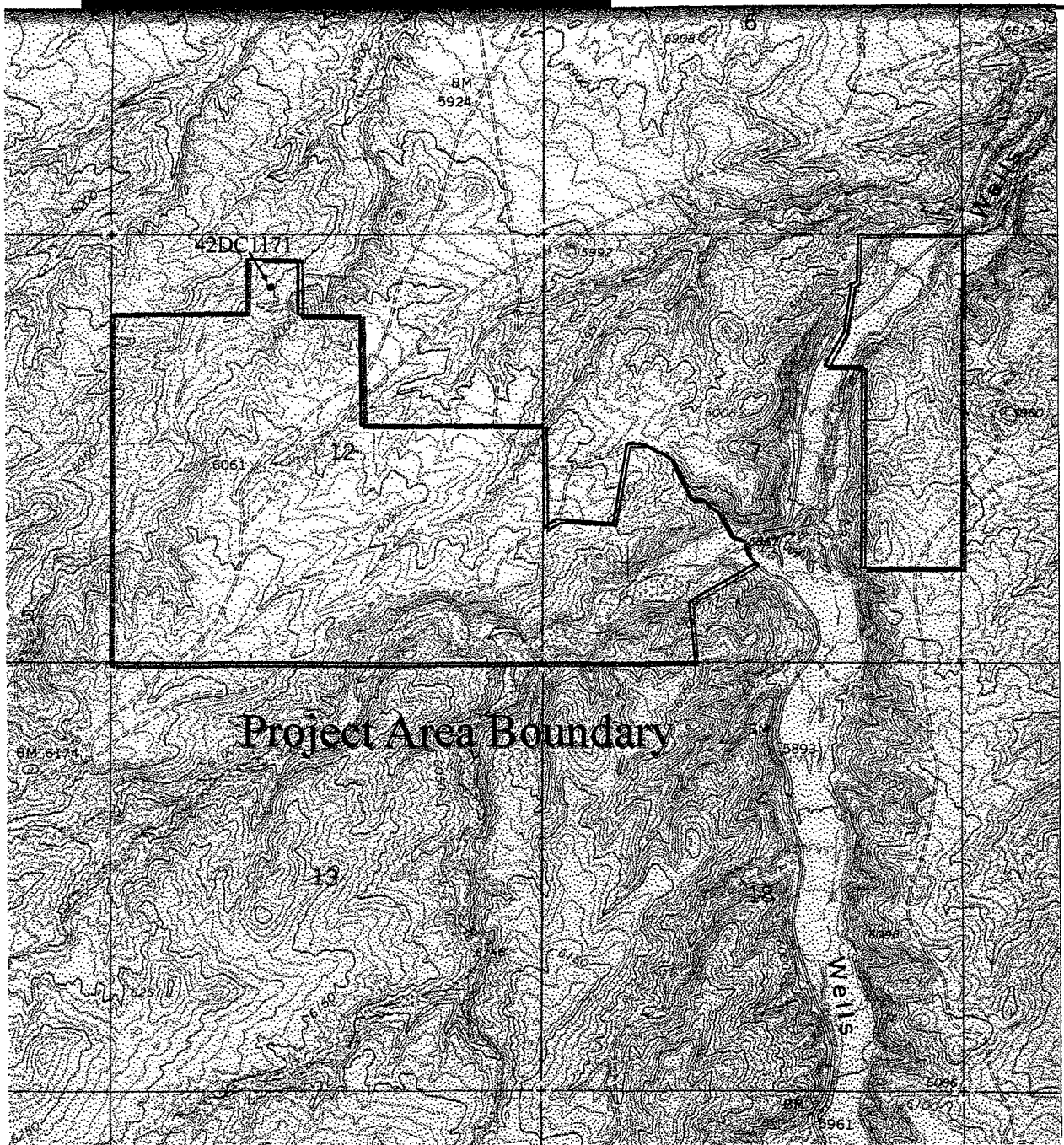




MAP: 2  
CULTURAL RESOURCE SURVEY  
OF INLAND'S ASHLEY UNIT  
IN THE WELLS DRAW LOCALITY  
OF DUCHESNE COUNTY, UTAH



PROJECT: IPC98-4  
SCALE: 1:24,000  
QUAD: Myton SW  
DATE: July 8, 1998



TOWNSHIP: 9 South  
RANGE: 15 and 16 East  
MERIDIAN: SL B. & M.

LEGEND



Area  
Inventoried

• CULTURAL  
SITE

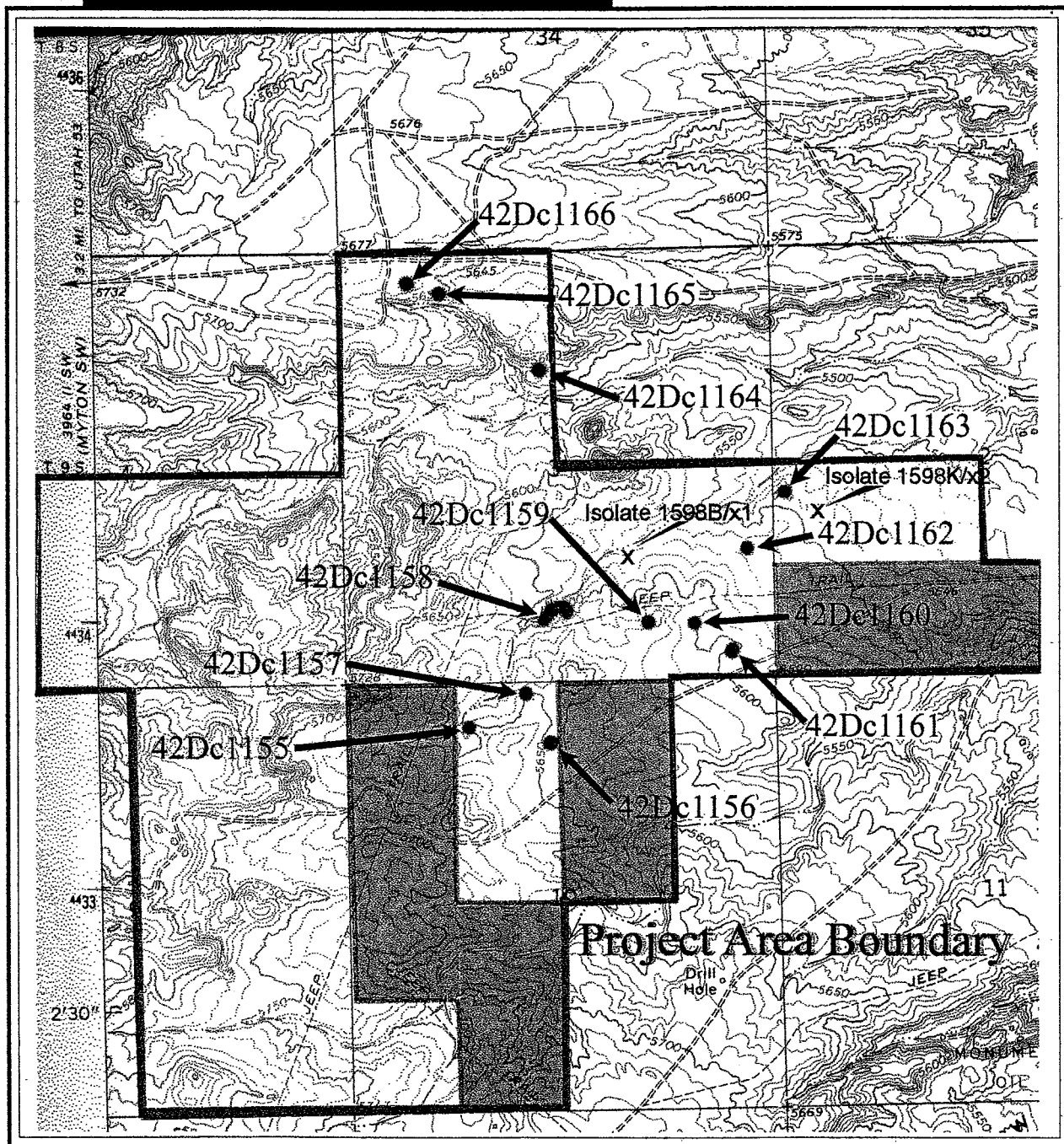


MAP: 3  
CULTURAL RESOURCE SURVEY  
OF INLAND'S SOUTH WELLS DRAW  
UNIT IN THE CASTLE PEAK DRAW  
LOCALITY OF UINTAH COUNTY, UTAH



PROJECT: IPC98-4  
SCALE: 1:24,000  
QUAD: Myton SE  
DATE: July 3, 1998

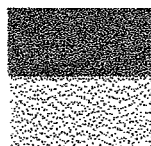
4



LEGEND



TOWNSHIP: 9 South  
RANGE: 16 East  
MERIDIAN: SL B. & M.



Area Reported in  
IPC97-5A & 98-3B  
Reports  
Area Reported  
Pertinent to this  
Report

• CULTURAL  
SITE  
X ISOLATED  
ARTIFACT

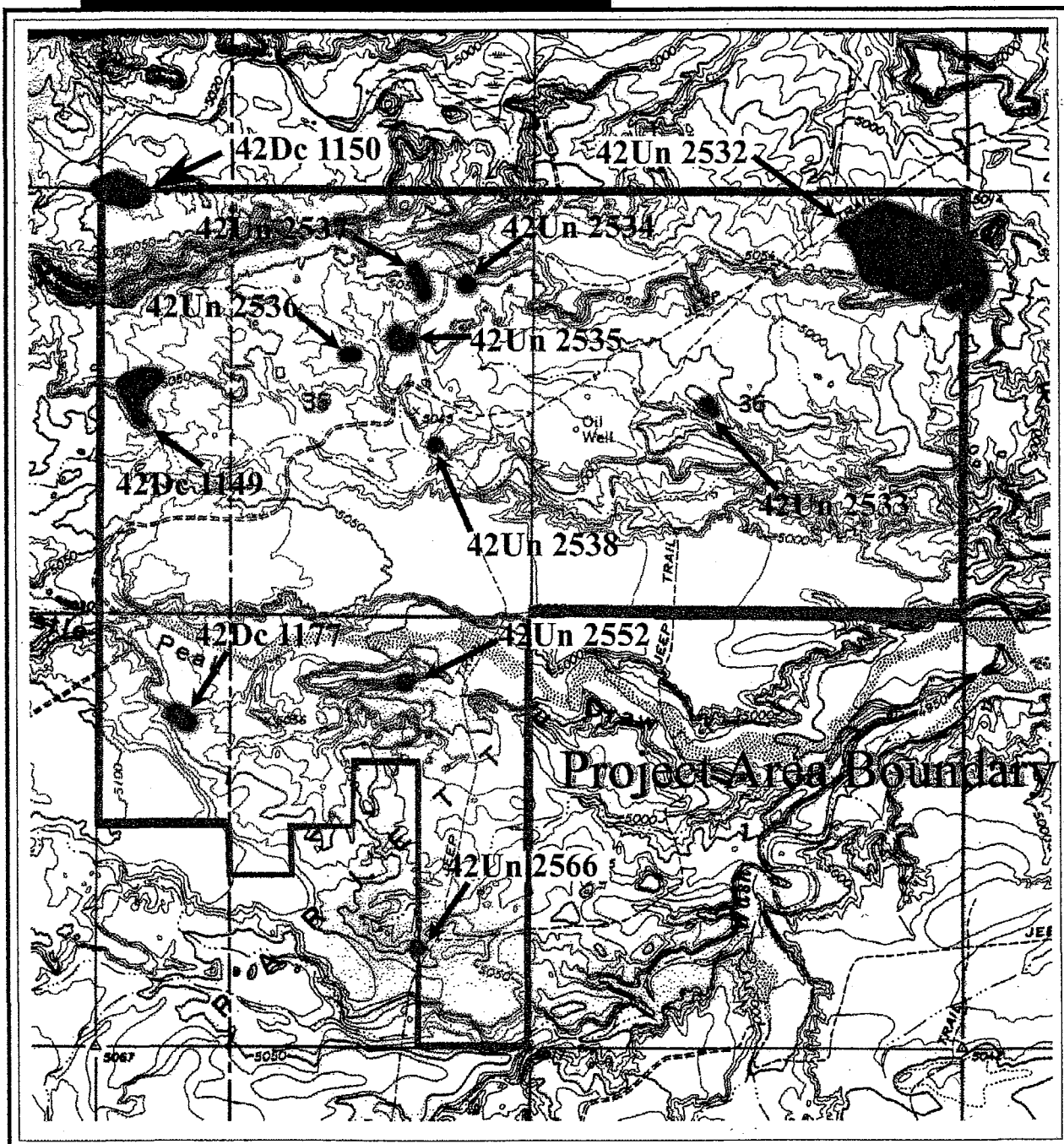
SURVEYED TWICE?  
DIFFERENT LOOK TO ORIGINAL DIGITIZING



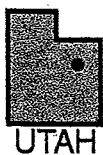
**MAP 4: CULTURAL RESOURCE  
SURVEY OF INLAND'S ODEKIRK  
SPRINGS UNIT IN THE CASTLE PEAK  
DRAW LOCALITY OF DUCHESNE &  
UINTAH COUNTIES, UTAH**



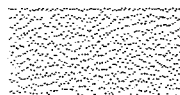
**PROJECT:** IPC98-4  
**SCALE:** 1:24,000  
**QUAD:** Pariette Draw SW  
**DATE:** July 3, 1998



**LEGEND**



**TOWNSHIP:** 8 and 9 South  
**RANGE:** 17 East  
**MERIDIAN:** SL B. & M.



**Area  
Inventoried**

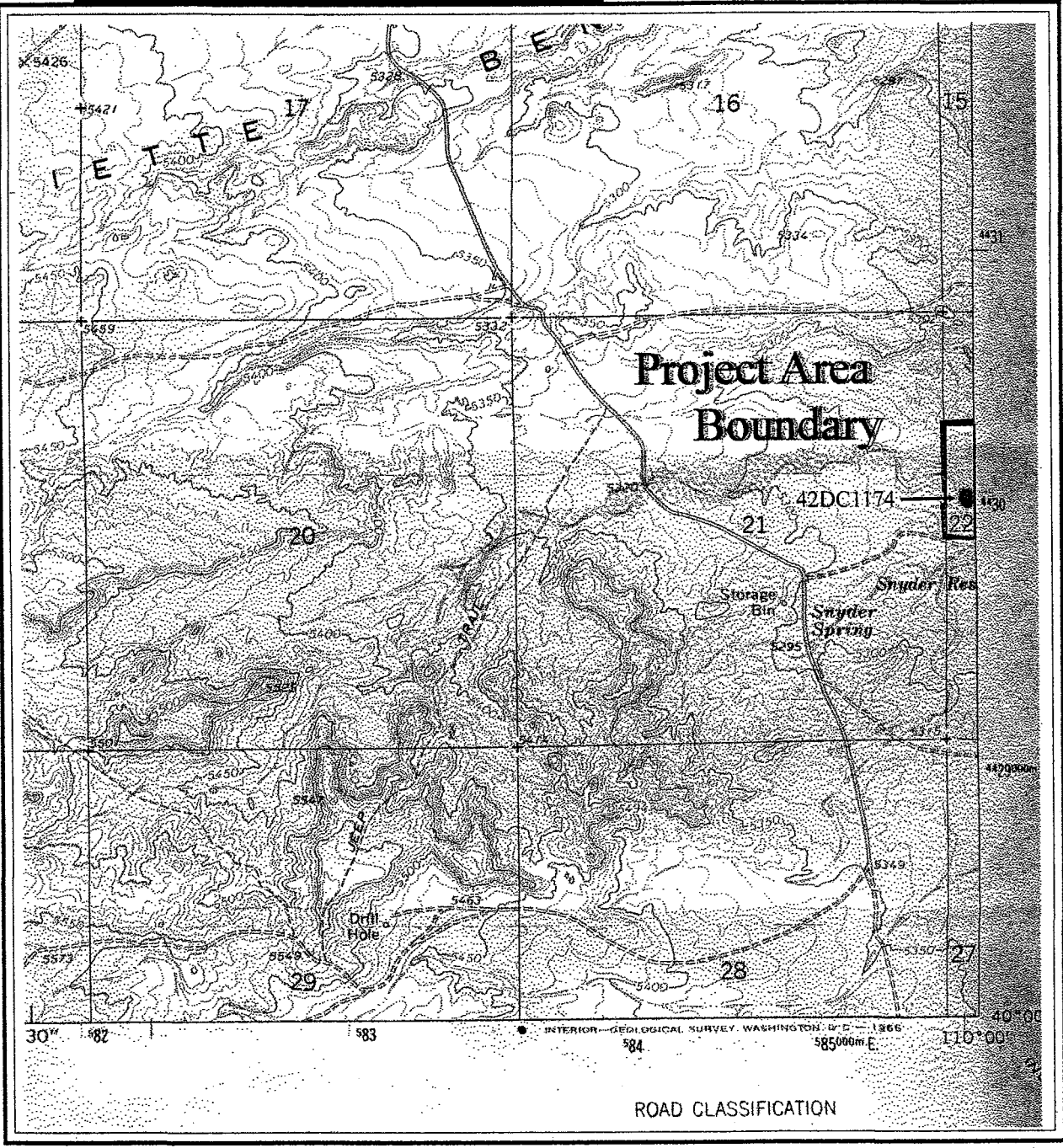
**• CULTURAL  
SITE**



MAP: 5 CULTURAL RESOURCE  
SURVEY OF INLAND'S SOUTH  
PLEASANT VALLEY UNIT IN THE  
PARIETTE BENCH LOCALITY  
OF DUCHESNE COUNTY, UTAH



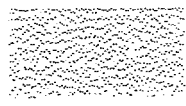
PROJECT: IPC98-4  
SCALE: 1:24,000  
QUAD: Myton, SE  
DATE: July 9, 1998



LEGEND



TOWNSHIP: 9 South  
RANGE: 17 East  
MERIDIAN: SL B. & M.



Area  
Inventoried

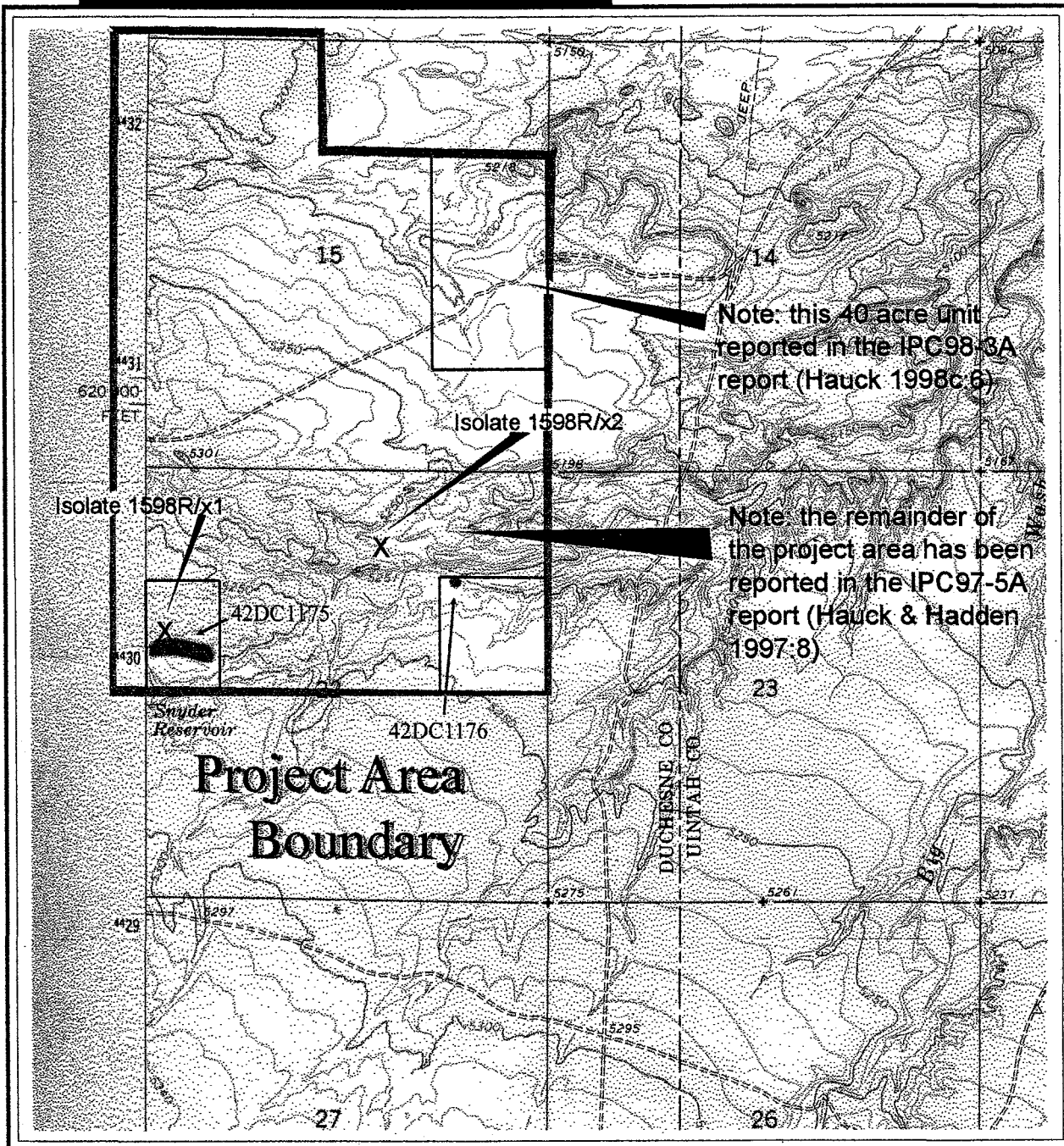
• CULTURAL  
SITE



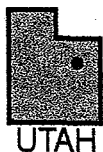
MAP: 6 CULTURAL RESOURCE  
SURVEY OF INLAND'S SOUTH  
PLEASANT VALLEY UNIT IN THE  
PARIETTE BENCH LOCALITY  
OF DUCHESNE COUNTY, UTAH



PROJECT: IPC98-4  
SCALE: 1:24,000  
QUAD: Pariette Draw SW  
DATE: July 9, 1998



LEGEND



TOWNSHIP: 9 South  
RANGE: 17 East  
MERIDIAN: SL B. & M.



Area Examined  
Pertinent to this  
Report

• CULTURAL  
SITE

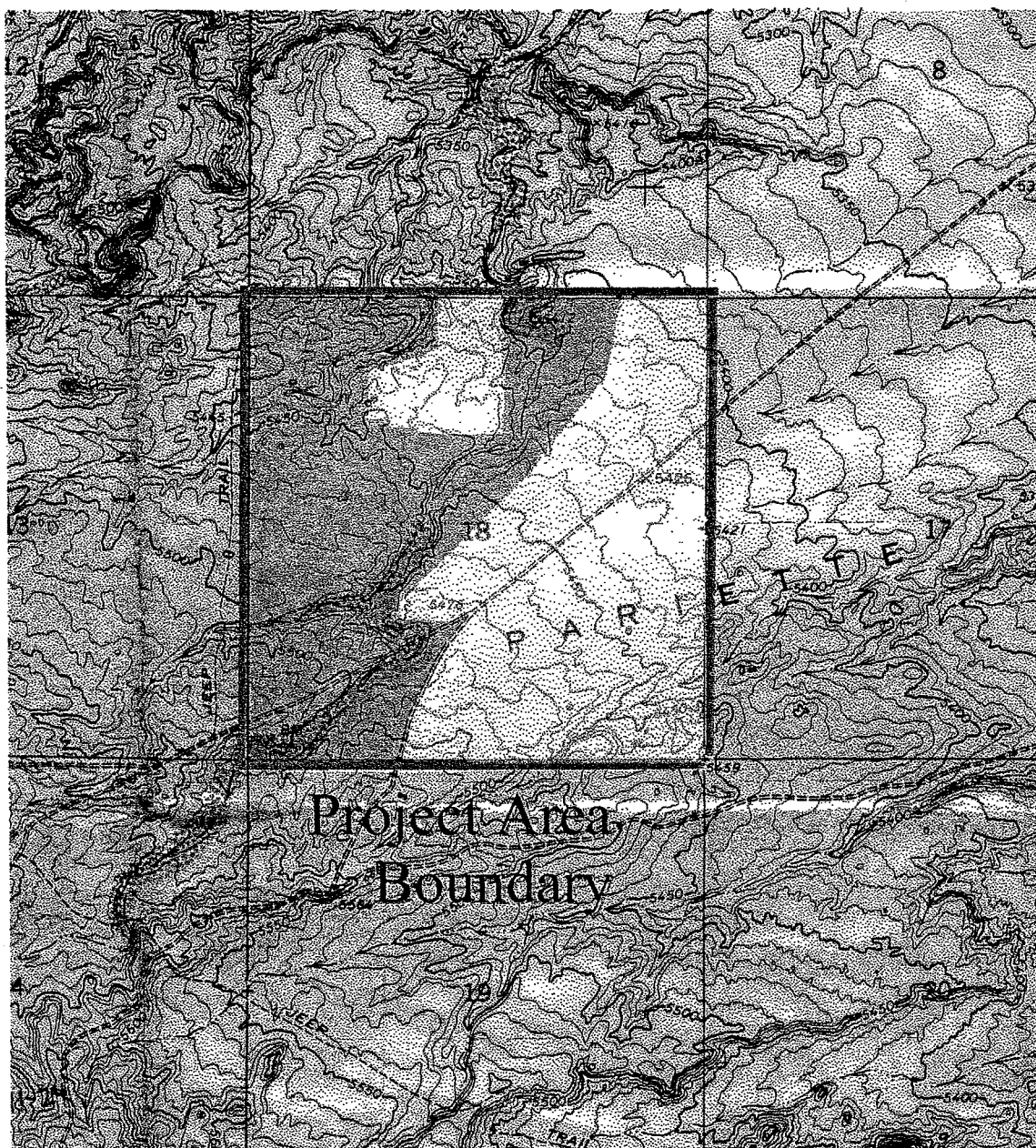
X ISOLATED  
ARTIFACT



**MAP 7:  
CULTURAL RESOURCE SURVEY  
OF INLAND BULK ACREAGE IN THE  
SOUTH PLEASANT VALLEY LOCALITY  
OF DUCHESNE COUNTY, UTAH**



**PROJECT:** IPC98-4  
**SCALE:** 1:24,000  
**QUAD:** Myton SE, Utah  
**DATE:** July 9, 1998



**TOWNSHIP:** 9 South  
**RANGE:** 17 East  
**MERIDIAN:** SL B. & M.

**LEGEND**



Bulk Acreage Survey Evaluated in  
1997 as Reported in Hauck &  
Hadden 1997:5 (IPC97-5A, Map 4)

Bulk Acreage Survey Completed in  
Spring 1998 for this Report



the Myton SE, Myton SW, and Pariette Draw SW 7.5 minute USGS quads as shown on Map 2 through Map 7. The seven inventoried tracts are located in the following Lease Units:

**Ashley Unit (see Map 2)**

Evaluated parcels in this unit, as reported in this current document, total 689 acres and include the southern half and portions of the northwest and northeast quarters of Section 12, Township 9 South, Range 15 East (Salt Lake B. & M.). Portions of the southwest quarter, the northeast quarter, and the southeast quarter of Section 7, Township 9 South, Range 16 East are also included.

This acreage includes the following locations: 3-12, 5-12, 6-12, 9-12, 10-12, 11-12, 13-12, 14-12, 15-12, 16-12 (all in Section 12), and 1-7, 8-7, 9-7, 11-7, 13-7, and portions of 14-7 (all in Section 7).

**South Wells Draw Unit (see Map 3)**

Evaluated portions of this unit, as reported in this current document, total 1,240 acres and include the northern half of the southwest quarter of Section 2, all of Section 3 except for the northeast quarter, the southeast quarter and the eastern half of the southwest quarter of Section 4, the eastern half of Section 9, and the eastern half of the northwest quarter and the southwest quarter of the southwest quarter of Section 10, Township 9 South, range 16 East.

This acreage includes the following locations: 11-2 and 12-2 (in Section 2), 3-3, 4-3, 5-3, 6-3, 9-3, 10-3, 11-3, 12-3, 13-3, 14-3, 15-3, and 16-3 (in Section 3), 9-4, 10-4, 11-4, 12-4, 13-4, 14-4, 15-4, and 16-4 (in Section 4), 1-9, 2-9, 7-9, 8-9, 9-9, 10-9, 15-9, 16-9 (in Section 9), and 3-10, 6-10, and 13-10 (in Section 10).

**Odekirk Springs Unit (see Map 4)**

Evaluated portions of this unit, as reported in this current document, total 1,529 acres and include Sections 35 and 36 of Township 8 South, Range 17 East. In addition, portions of the northwest, northeast, and southeast quarters of Section 2, Township 9 South, Range 17 East were also evaluated.

This acreage includes the following locations: 1-35 through 16-35 in Section 35, 1-36 through 16-36 in Section 36, and previously unevaluated acreage associated with units 1-2, 2-2, 3-2, 4-2, 5-2, 6-2, 7-2 8-2, 9-2, and 16-2 all in Section 2. 9-17

**South Pleasant Valley Unit (see Maps 5, 6, and 7)**

Evaluated portions of this unit total 461 acres and include the southeast quarter of the northeast quarter and the northeast quarter of the southeast quarter of Section 15 (also noted in



Hauck 1998c), portions of the northeast, northwest and southwest quarters of Section 18, and, in Section 22, the southwest quarter of the northwest quarter and the southeast quarter of the northeast quarter.

This acreage includes the following locations: 8-15 and 9-15 in Section 15 (previously reported in Hauck 1998c), units 2-18, 4-18, 5-18, 6-18, and portions of 7-18, 11-18, 12-18, 13-18, and portions of 14-18 in Section 18, and 5-22, 8-22 in Section 22.

### **Environmental Description**

The various project tracts associated with this report are within the 5200 to 6100 foot elevation zone above sea level. Open rangeland terrain and eroded Eocene lake bed surfaces are affiliated with the entire project area.

The vegetation in the project area includes rabbit brush (*Chrysothamnus spp.*), sagebrush (*Artemisia spp.*), Winterfat (*Ceratoides lanata*) greasewood (*Sarcobatus spp.*), Sulphur flower Buckwheat (*Eriogonum umbellatum*) Mormon tea (*Ephedra viridis*), Halogeton, Mountain Mahogany (*Cercocarpus spp.*), saltbush (*Atriplex canescens*), and a variety of grasses.

The geological associations within the project area consist of Quaternary age sand and gravel deposits and fluvial lake deposits which correlate with the Uintah Formation of Tertiary age throughout the remainder of the tracts being considered in this report.

## **PREVIOUS RESEARCH IN THE LOCALITY**

### **File Search**

A records search of the site files and maps at the Antiquities Section of the State Historic Preservation Office in Salt Lake City was conducted on November 6, 1997 in association with the primary project as requested by Inland Resources, Inc. A similar search was conducted in the Vernal District Office of the BLM on November 10, 1997 and March 18, 1998. Searches were also initiated during the spring of 1998 in order to check various parcels added to the evaluation by Inland Resources. The National Register of Historic Places was consulted and no registered historic or prehistoric properties will be affected by the proposed developments.

A variety of known cultural sites are situated in the general locality. Many of these prehistoric resources were identified and recorded by AERC and other archaeologists and consultants during oil and gas exploration inventories (cf., Fike and Phillips 1984, Hauck and Weder 1989, Hauck (various), Hauck and Hadden 1993, 1994, 1995, 1996, 1997).



## Prehistory of the Cultural Region

Currently available information indicates that the Northern Colorado Plateau Cultural Region has been occupied by a variety of cultures beginning perhaps as early as 10,000 B.C. These cultures, as identified by their material remains, demonstrate a cultural developmental process that begins with the earliest identified Paleoindian peoples (10,000 - 7,000 B.C.) and extends through the Archaic (ca. 7,000 B.C. - 300 A.D.), and Formative (ca. A.D. 400 - 1100) stages, and the Late Prehistoric-Protohistoric periods (ca. A.D. 1200 - 1850) to conclude in the Historic-Modern Period which was initiated with the incursion of the Euro-American trappers, explorers and settlers. Basically, each cultural stage--with the possible exception of the Late Prehistoric hunting and gathering Shoshonean bands--features a more complex life-way and social order than occurred during the earlier stage of development (Hauck 1991:53). For a more comprehensive treatment of the prehistory and history of this region see *Archaeological Evaluations in the Northern Colorado Plateau Cultural Area* (Hauck 1991).

## Site Potential in the Project Development Zone

Previous archaeological evaluations in the general project area have resulted in the identification and recording of a variety of cultural resource sites having eligibility for potential nomination to the National Register of Historic Places. The majority of these sites are lithic scatters containing cobble reduction materials. Many of these quarry sites are of the "tap and test" variety, and extend for tens of hundreds of meters. Open occupations are also frequently being identified in this locality. Sites associated with the open rangeland generally appear to have been occupied during the Early and Middle Plains Archaic Stage with occasional indications of Paleoindian activity based on the recovery of both Llano and Plano style projectile points as isolated artifacts and from archaeological sites. The north-south drainage canyons appear to contain the majority of Late Prehistoric (Numic) sites probably because those canyon floors were transportation corridors and convenient pastures for the Ute horse herds. Evidence of Formative Stage occupation, i.e. Fremont, is rarely observed in the rangeland environment but is common within the Green River and White River canyons and their primary tributary canyons.

Site density in certain portions of the region appears to range from one to four sites per section. These densities increase in the canyon bottoms due to Ute rock art loci. Recent evaluations indicate that the site densities may reach 8 to 12 sites per section for a site/acre ratio ranging between 1/80 and 1/53 in certain localities on the upper benches which were apparently favored for hunting, lithic resource procurement, and camping. Prehistoric sites on the rangeland benches appear to be associated with water courses and aeolian deposits. In the Wells Draw and Castle Peak Draw localities, site density appears to be very high (possibly as high as the site/acre ratio of 1/25), especially in areas near water courses and seep sources.



## FIELD EVALUATIONS

### Methodology

Intensive evaluations consisted of the archaeologists walking a series of 10 to 20 meter-wide transects within the various tracts as defined above for this project area. Thus, 3,919 acres were inventoried relative to this present project.

Observation of cultural materials results in intensive examinations to determine the nature of the resource (isolate or activity locus). The analysis of each specific site results in its subsequently being sketched, photographed, and appropriately recorded on standard IMACS forms.

In certain instances, the cultural sites are evaluated for depth potential utilizing AERC's portable Ground Penetrating Radar (GPR) computerized system (SIR-2 manufactured by Geophysical Survey Systems, Inc. of North Salem, New Hampshire). GPR was not used during this project.

Following these field analyses, cultural sites are then evaluated for significance utilizing the standards described below and mitigation recommendations are developed by the principal investigator in consultation with both the client and relevant governmental agencies as a means of preserving significant resources which may be situated within the development zone.

### Site Significance Criteria

Prehistoric and historic cultural sites which can be considered as eligible for nomination to the National Register of Historic Places have been outlined as follows in the National Register's Criteria for Evaluation as established in Title 36 CFR 60.6:

*The quality of significance in American . . . archaeology . . . and culture is present in . . . sites . . . that possess integrity of location, design, setting, materials, workmanship, feeling, and association and:*

- a. That are associated with events that have made a significant contribution to the broad patterns of our history; or*
- b. that are associated with the lives of persons significant in our past; or*
- c. that embody the distinctive characteristics of a type, period, or method of construction . . . ; or*
- d. that have yielded, or may be likely to yield, information important in prehistory or history.*



In addition to satisfying one or more of these general conditions, a significant cultural resource site in Utah will generally be considered as eligible for inclusion in the National Register if it should advance our current state of knowledge relating to chronology, cultural relationships, origins, and cultural life ways of prehistoric or historic groups in the area.

In a final review of any site's significance, the site must possess integrity and at least one of the above criteria to be considered eligible for nomination to the National Register of Historic Places.

### **Results of the Inventory**

A total of 28 prehistoric archeological sites and four isolated artifacts was recorded during the archaeological evaluation of the various tracts in this project area. These sites consist of 42DC 1149, 1150, 1155-1166, 1171, 1174-1177 and 42UN 2532-2538, 2552, and 2566. A brief description of each site, the site maps, cultural significance determinations, and mitigation recommendations are provided in this portion of the report. A discussion of the four isolated diagnostic artifacts (1598B/x1, 1598K/x2, 1598R/x1 & 1598R/x2) follows the site discussion.

#### **Site 42DC 1149 (see Maps 4 and 8)**

This site is a large, diffuse scatter of lithic debitage, cores and tools on an elevated bench and ridge complex associated with stabilized aeolian deposits. The site occupation area occurs in and among a large sandstone outcrop or monolith at the highest/westernmost edge of the scatter area. Fire cracked rock concentrations, tools and shatter predominate at the occupation area, while primary flakes, cores and shatter occur at low rates across the remainder of the site.

##### **Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Units 5-35 and 12-35.**

#### **Site 42DC 1150 (see Maps 4 and 9)**

This site consists of a very large dispersed scatter of lithic debitage in all stages of reduction and tool manufacture, tools and hearth remains along the top and sides of a large dune. Artifacts are eroding from the dune field and are exposed in blowouts and along the dune.

##### **Nat. Register Status: Significant**

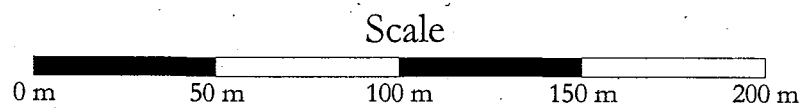
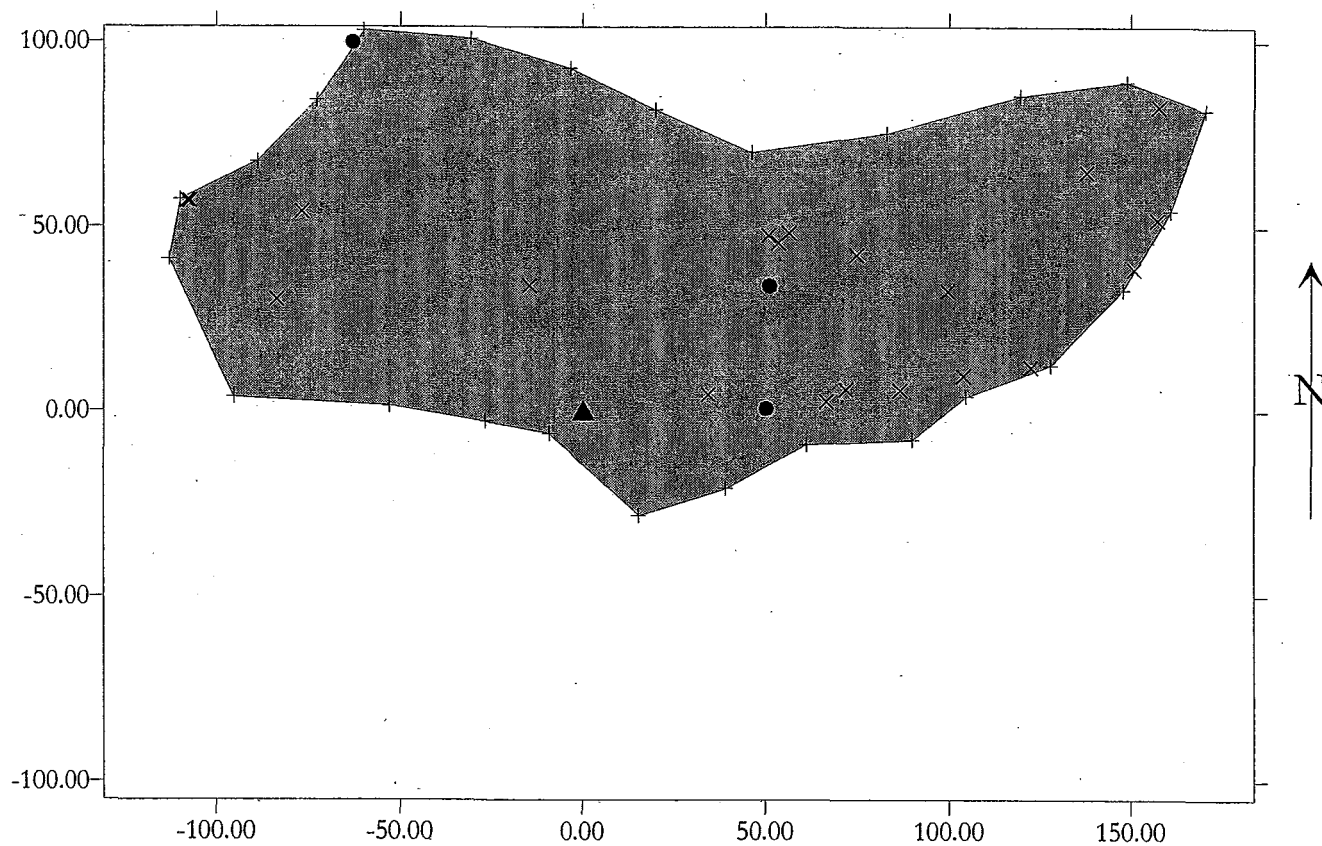
Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 4-35.**



# MAP 8: SITE 42DC 1149

14



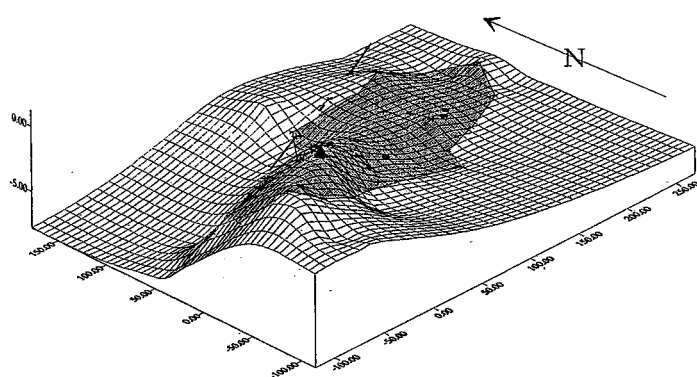
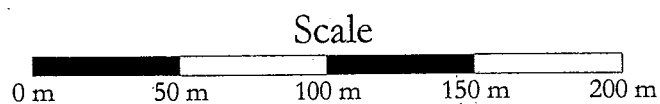
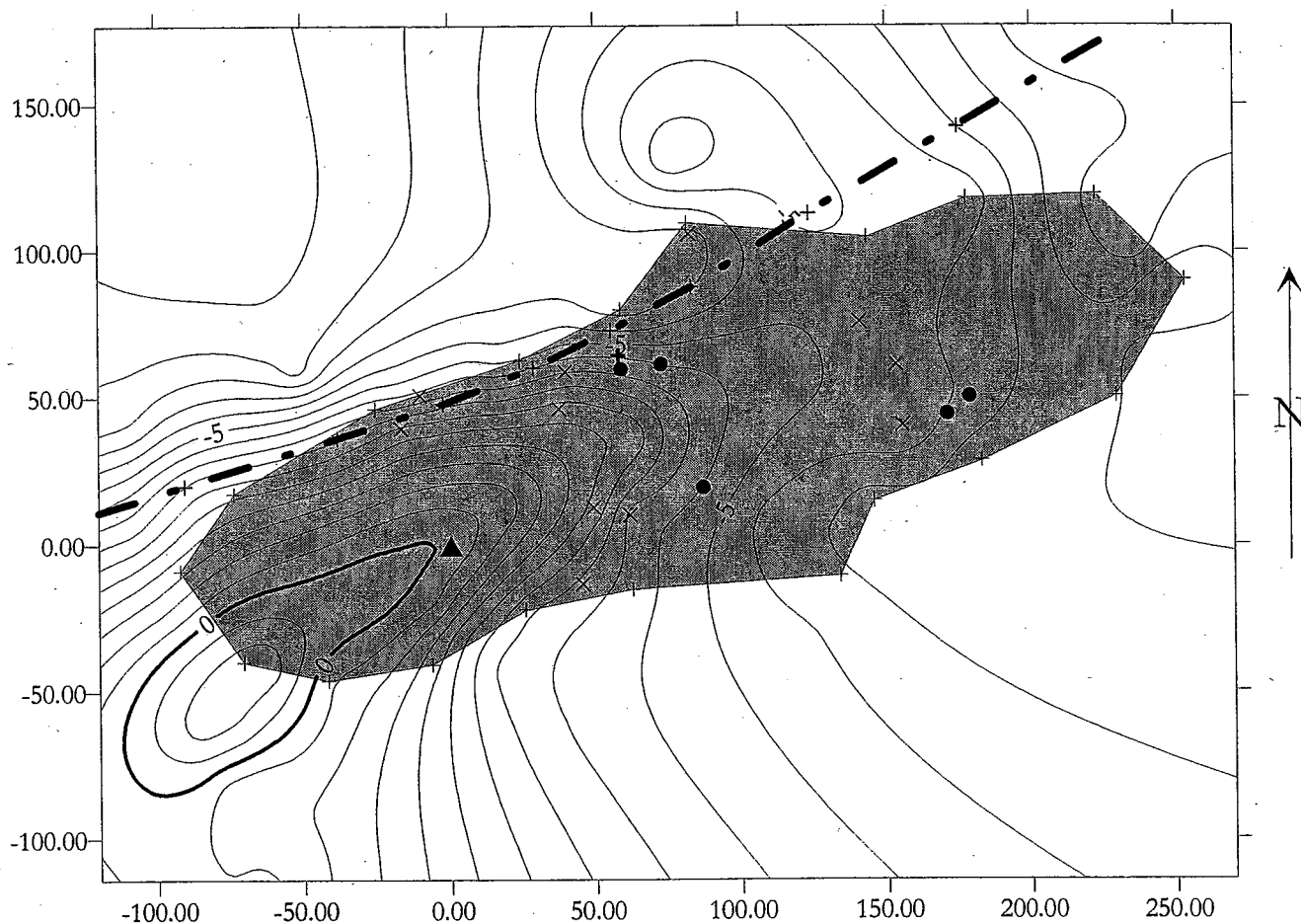
## Legend

- ▲ Primary Datum
- × Artifact Location
- Hearth
- Extent of Site



# MAP 9: SITE 42DC 1150

15



## Legend

- ▲ Primary Datum
- × Artifact Location
- Hearth
- ⊕ Section Corner
- - - Pipeline
- Extent of Site



**Site 42DC 1155 (see Maps 3 and 10)**

Site consists of a scatter of Mesa Verde corrugated grayware that was manufactured during the late Pueblo-II, early Pueblo-III occupation in the Southwest cultural area. The artifact evidently represents a trade item brought into the Uinta Basin. Similar artifacts have been previously recorded for this region and the adjacent White River region of northwestern Colorado (Hauck 1991). The site was located within sandstone bedrock exposures.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1156 (see Maps 3 and 10)**

Site consists of dispersed lithic scatter of about five fragments of debitage and a Paleoindian point midsection (see Figure 1A) that may be a portion of an Eden point. This site is located on a flat surface southeast of an isolated low knoll. The artifacts are all localized Parachute Creek chert.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1157 (see Maps 3 and 11)**

Site consists of scoured rock shelter-ledge complex with an associated lithic scatter of 5+ fragments of Parachute Creek chert debitage. Also observed on the site was a single, simple biface or chopper exhibiting alternate flaking. Similar tools have been observed in Paleoindian through Middle Archaic large game butchering contexts.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1158 (see Maps 3 and 12)**

Site consists of series of scoured rock shelters, an associated lithic scatter, one complete projectile point and a point midsection, biface tools and hearths. Parachute Creek chert tools and debitage predominate on the site. Features include three hearths and rock shelters. A complete projectile point of Plano through Early Archaic manufacture and a Paleoindian point midsection were collected (see Figures 1B and 1C).

**Nat. Register Status: Significant**

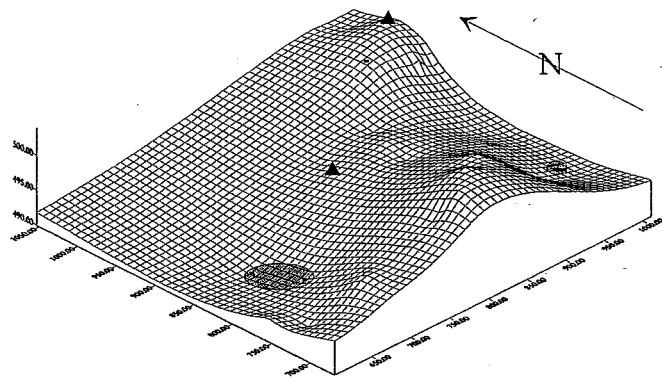
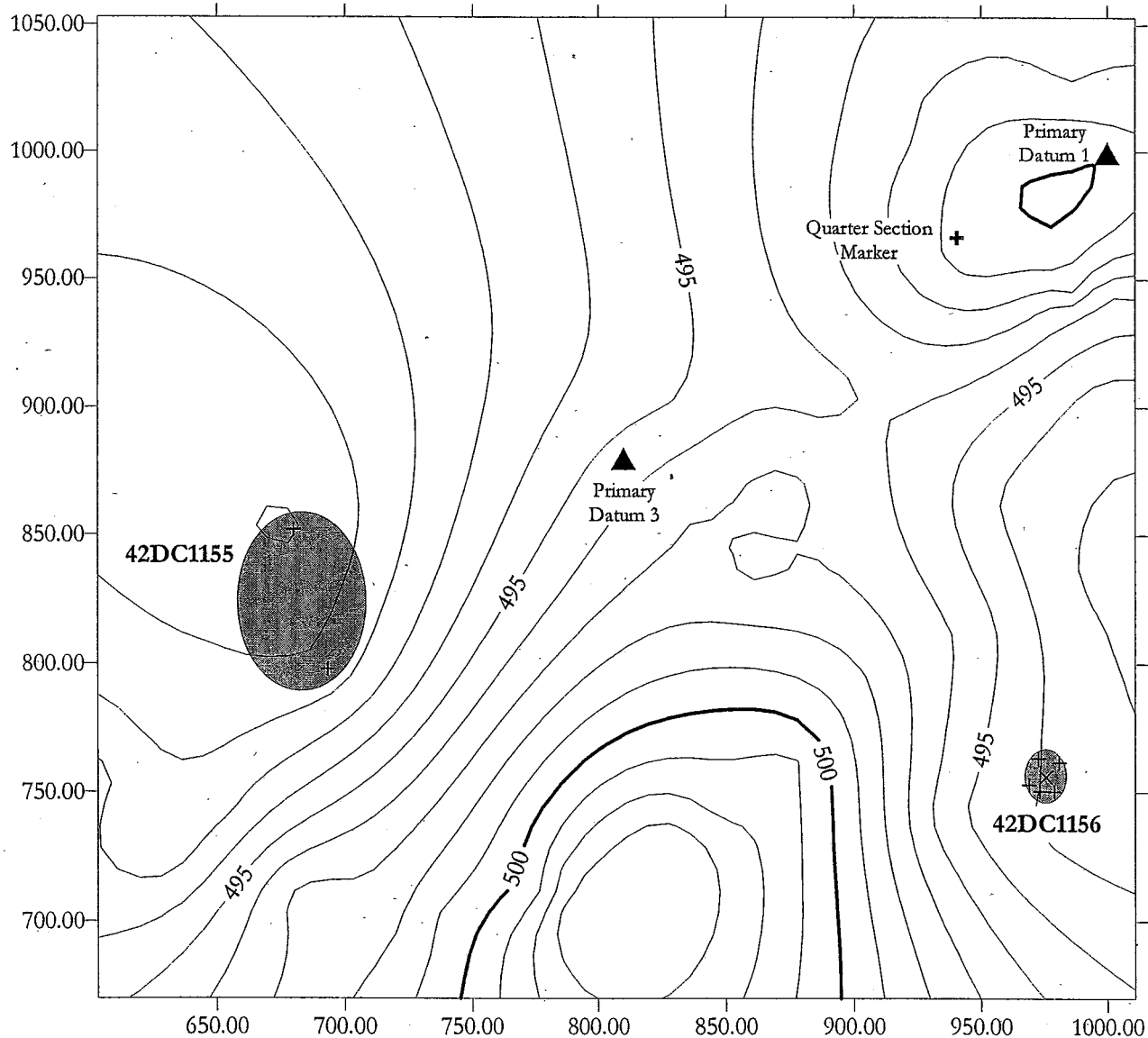
Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Units 14-3 and 15-3.**



# MAP 10: SITES 42DC 1155 & 42DC 1156

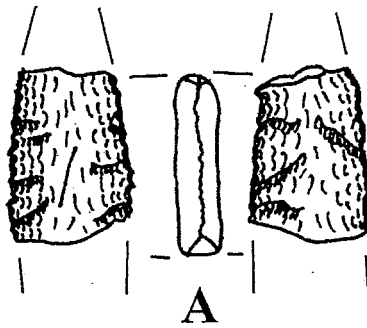
17



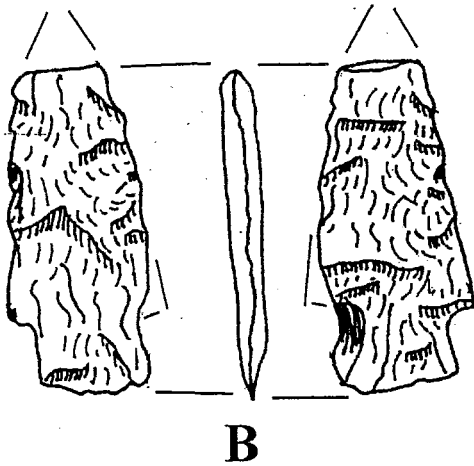
## Legend

- ▲ Datum Location
- × Artifact Location
- ⊕ Quarter Section Marker
- Extent of Site



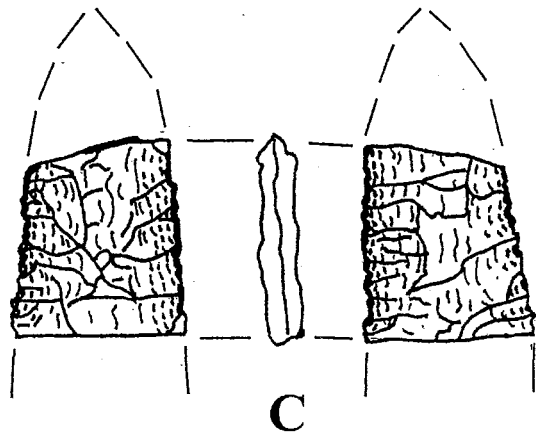


42DC 1156  
(FS-1022)



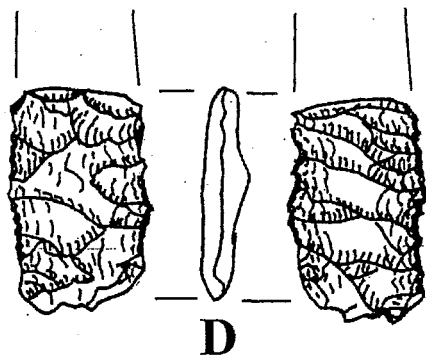
B  
FS-1012

42DC 1158



C  
FS-1007

42DC1159  
FS-1011

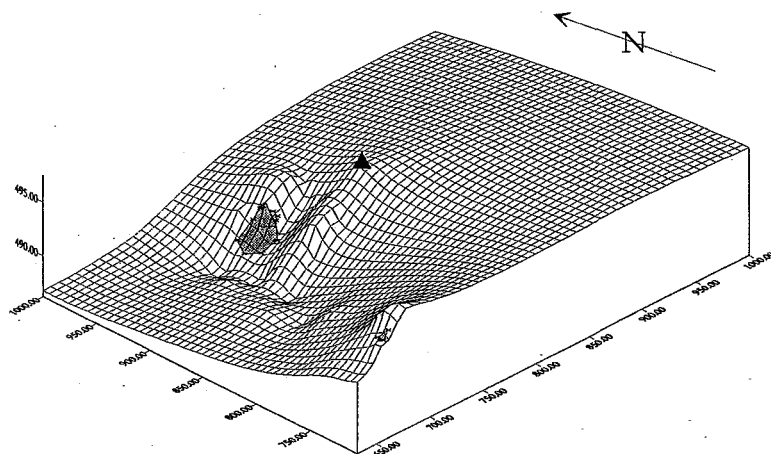
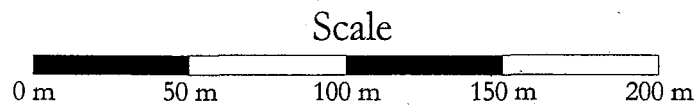
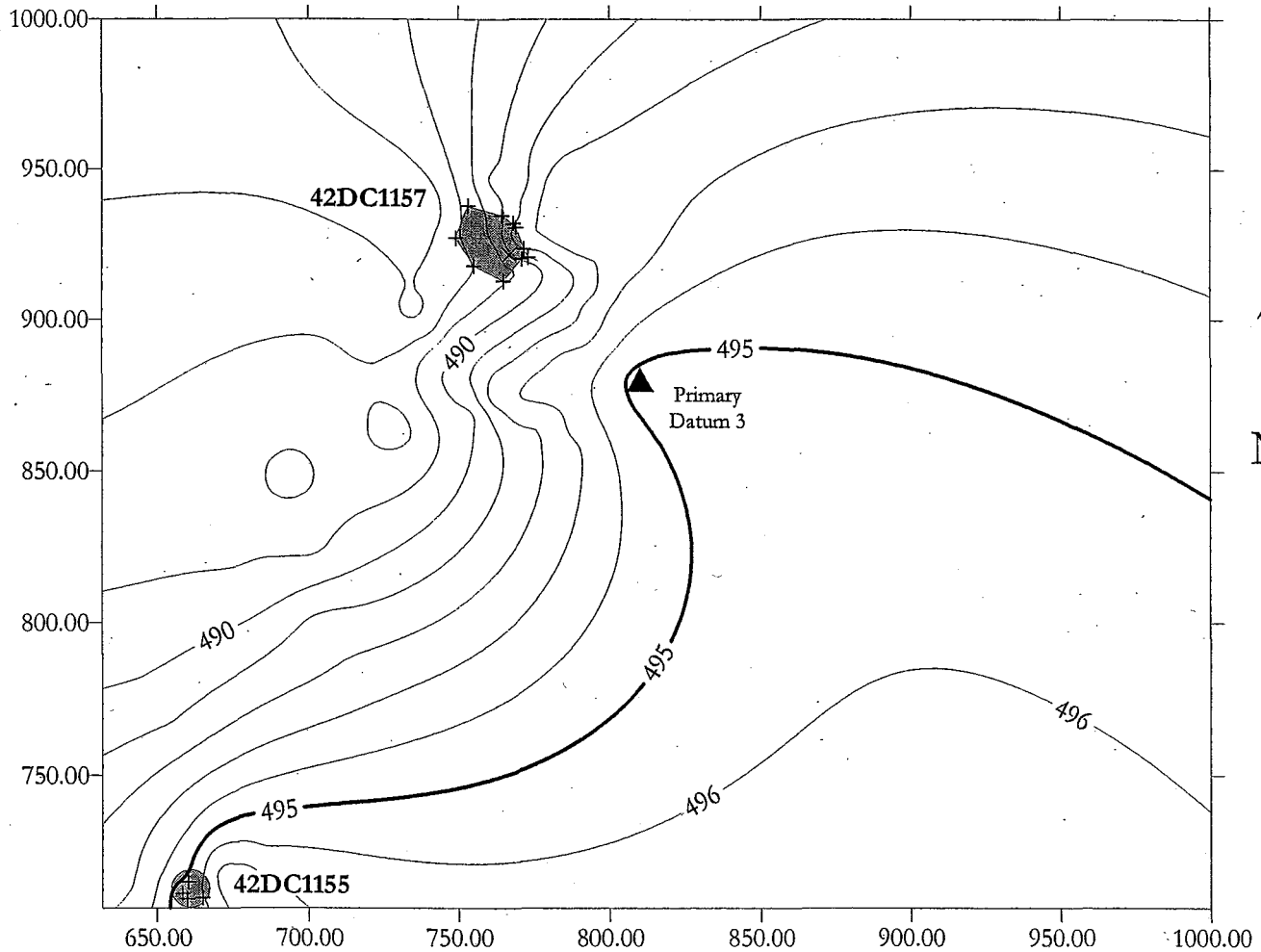


**FIGURE 1**



# MAP 11: SITE 42DC 1157

19



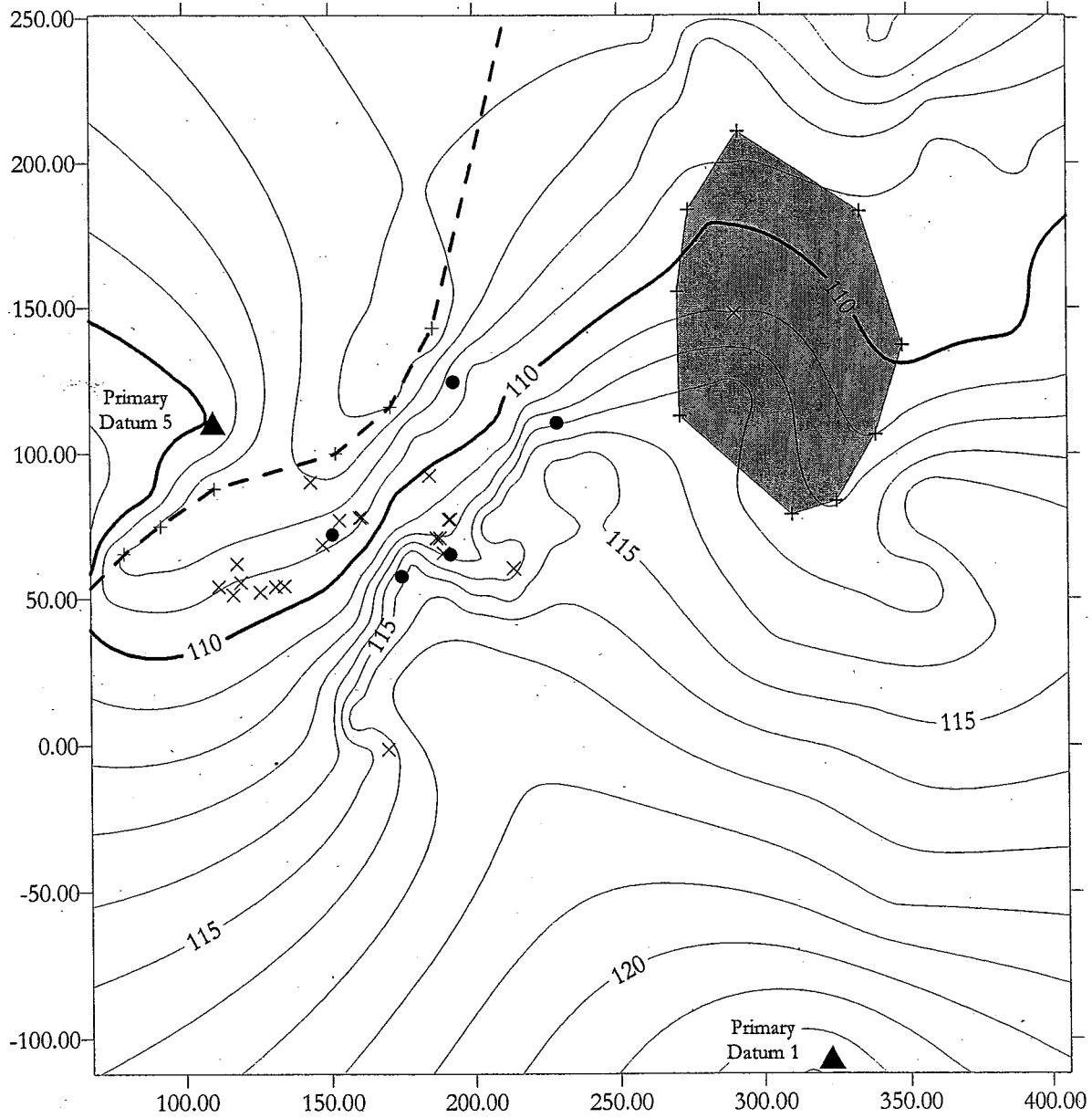
## Legend

- ▲ Datum Location
- × Artifact Location
- Extent of Site

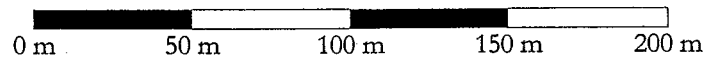


# MAP 12: SITE 42DC 1158

20

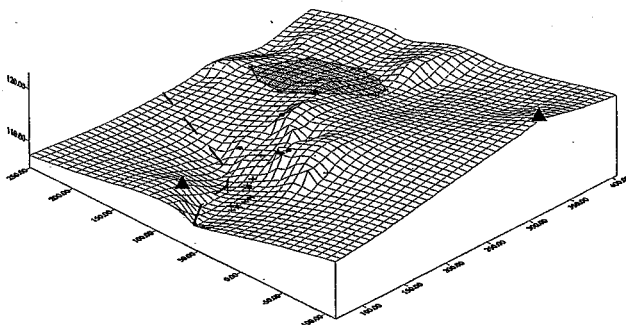


Scale



## Legend

- ▲ Datum Location
- × Artifact Location
- Feature
- \\ Drainage Channel
- Artifact Concentration





**Site 42DC 1159** (see Maps 3 and 13)

Site consists of dispersed lithic scatter located on the western slope drainage area of an isolated low knoll. Artifacts include Parachute Creek chert debitage, two bifaces and a Paleoindian (Goshen style) projectile point base (see Figure 1D).

**Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 15-3.**

**Site 42DC 1160** (see Maps 3 and 14)

Site consists of dispersed lithic scatter located in a shallow drainage area southeast of an isolated low knoll. Artifacts include Parachute Creek chert debitage, a unifacially retouched scraper and a core/chopper and projectile point (see Figure 2A) that was located some outside the main lithic scatter. The dart point appears to be an Elko Eared variety which correlates with the Early Archaic occupational phase of the Uinta Basin.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1161** (see Maps 3 and 15)

Site consists of an open occupation and lithic scatter located on a low ridge. Artifacts include a Paleoindian 'Alberta' point (see Figure 2B) and a number of bifaces. The dominant lithic material type is the local float consisting of Parachute Creek chert.

**Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 16-3.**

**Site 42DC 1162** (see Maps 3 and 16)

Site consists of an open occupation and lithic scatter located on a low ridge and into an adjacent plain to the south. Artifacts include a quartzite hammerstone, Parachute Creek chert cores, two bifaces and lithic debitage in all stages of lithic tool manufacture. The dominant lithic material type is Parachute Creek chert debitage.

**Nat. Register Status: Significant**

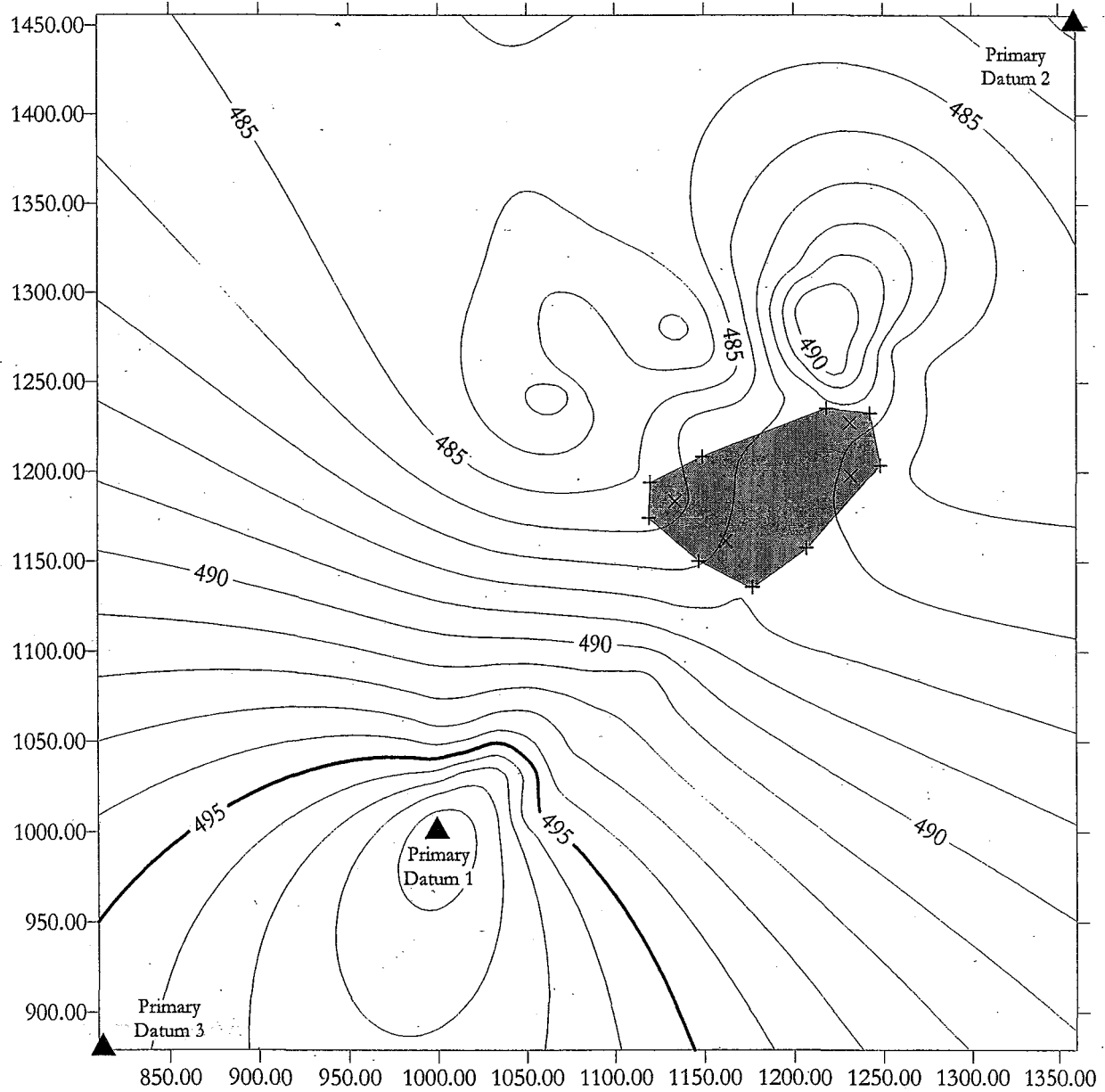
Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 9-3.**

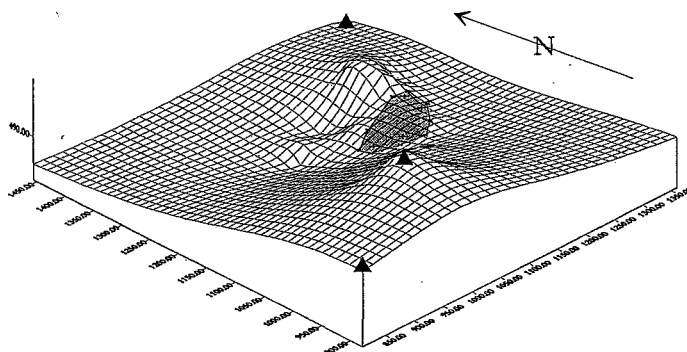
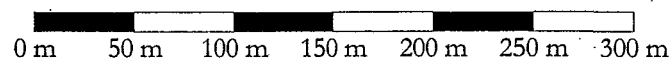


# MAP 13: SITE 42DC 1159

22



Scale



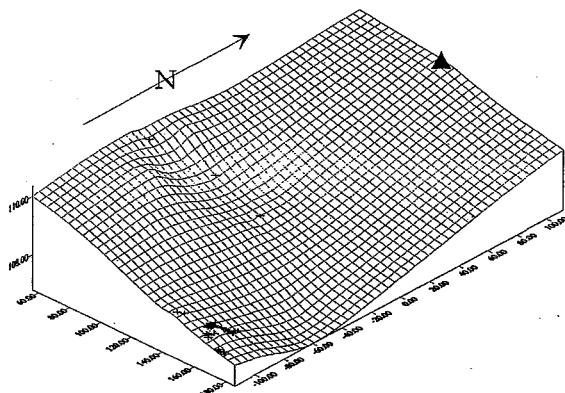
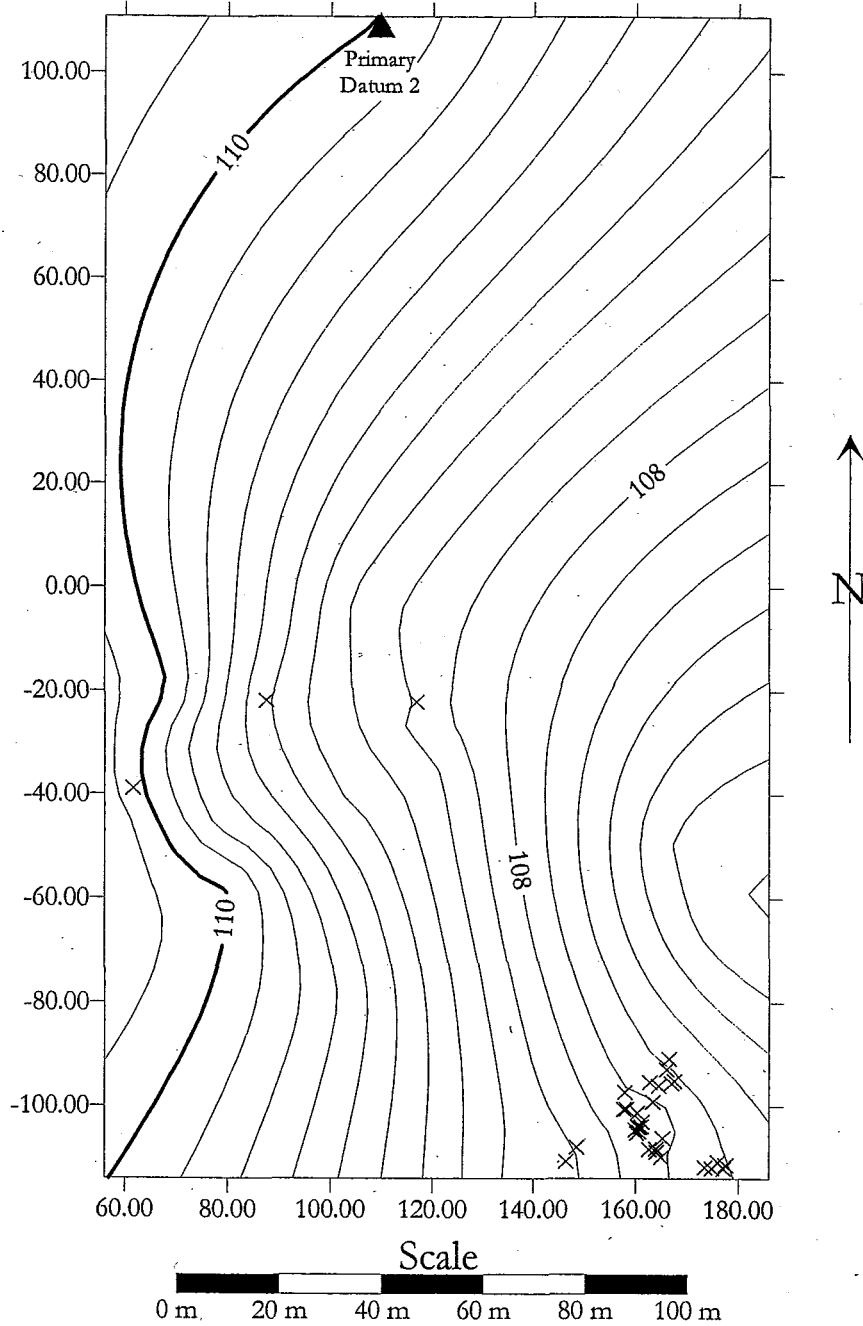
## Legend

- ▲ Datum Location
- × Artifact Location
- Extent of Site



# MAP 14: SITE 42DC 1160

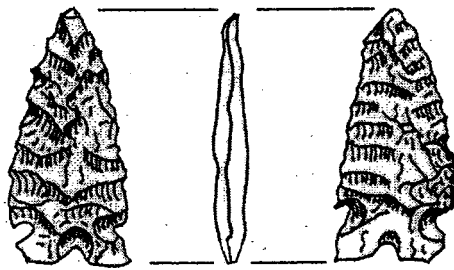
23



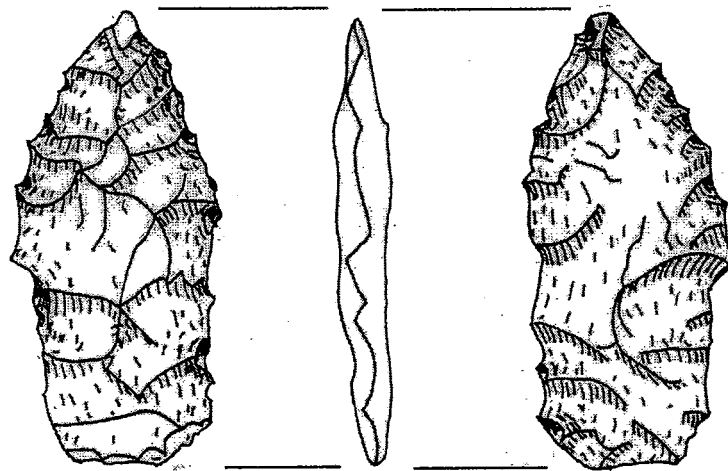
## Legend

- ▲ Datum Location
- × Artifact Location





**A**  
**42DC 1160**  
**(FS-1031)**



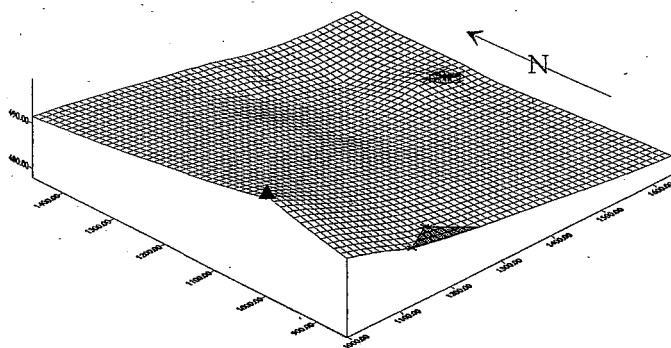
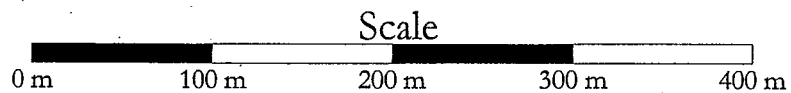
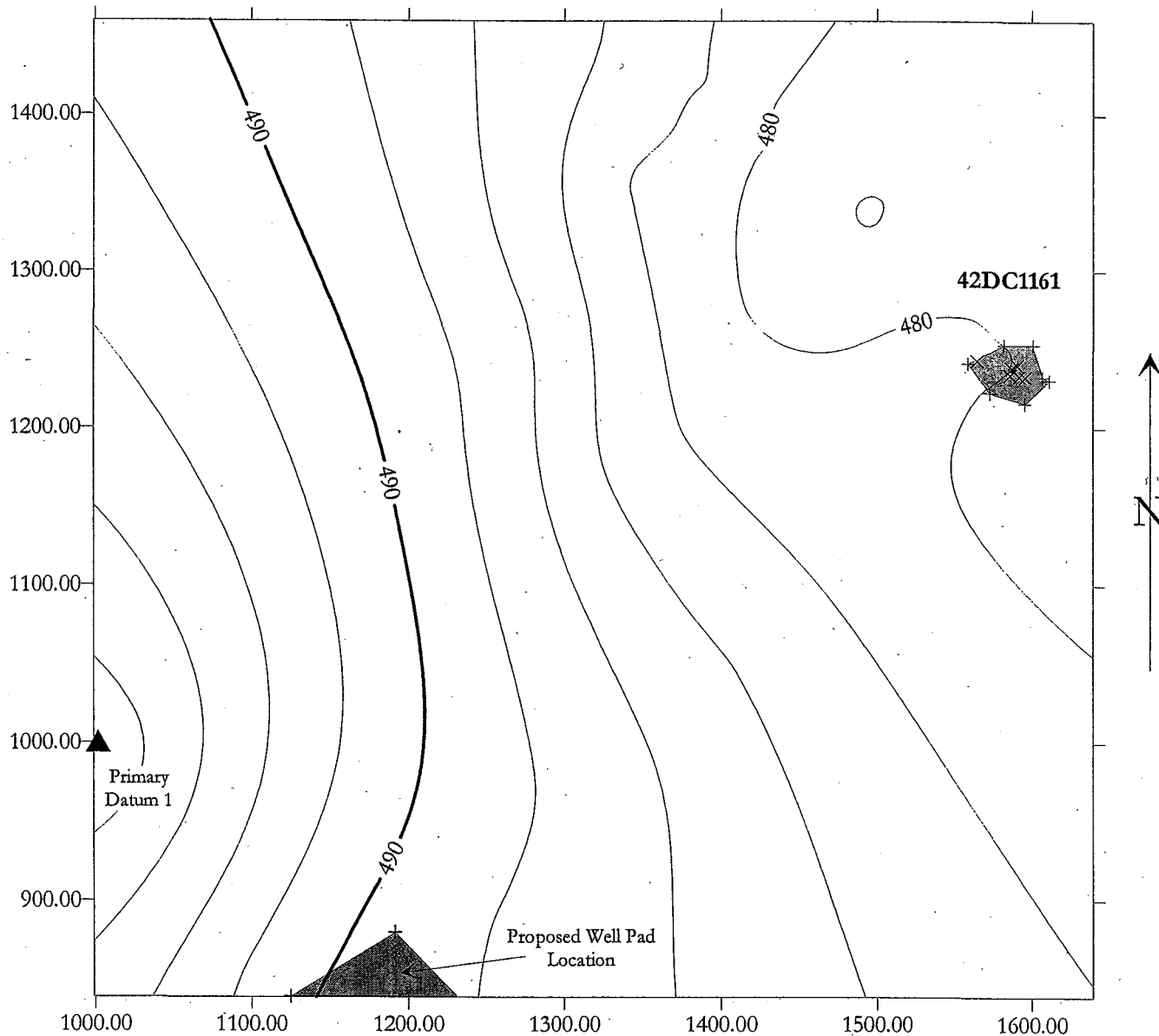
**B**  
**42DC 1161**

**FIGURE 2**



# MAP 15: SITE 42DC 1161

25



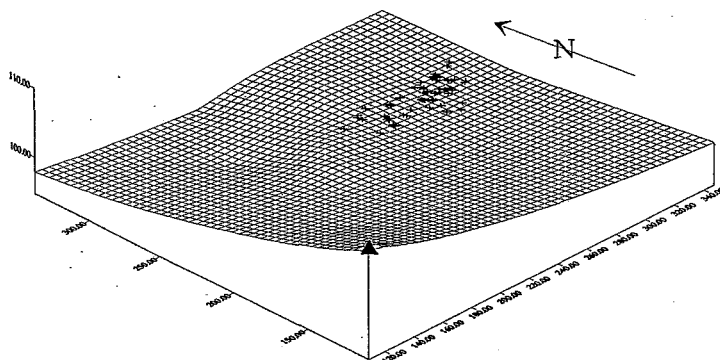
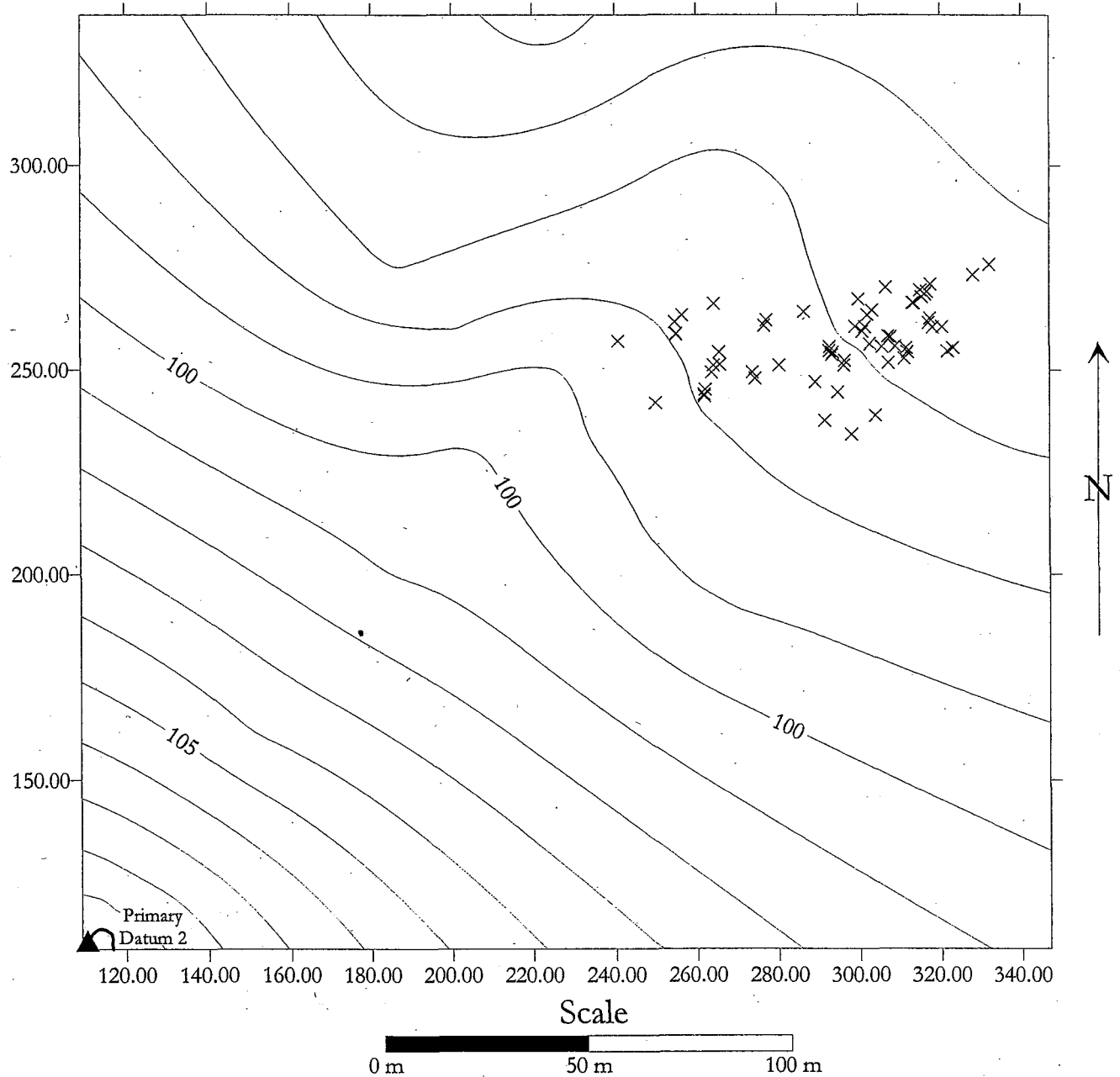
## Legend

- ▲ Datum Location
- × Artifact Location
- Proposed Well Pad Location
- Extent of Site



# MAP 16: SITE 42DC 1162

26



## Legend

- ▲ Datum Location
- × Artifact Location



**Site 42DC 1163 (see Maps 3 and 17)**

Site consists of a lithic scatter located on a sandy plain with a gradual slope on and around an isolated outcrop. Artifacts are limited to Parachute Creek chert debitage in all stages of lithic tool reduction and manufacture.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1164 (see Maps 3 and 18)**

Site consists of a dispersed lithic scatter located in and near a shallow drainage at the bottom of a steep hill. Artifacts include Parachute Creek chert debitage in all stages of lithic tool manufacture and several choppers and scrapers.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1165 (see Maps 3 and 19)**

Site consists of a dispersed scatter of lithic debitage, tools, ground stone and several deflated hearth scatters located on a ledge near the bottom of a slope. Ledges run westward from the site with scattered artifacts along the top and bottom of the ledge complex. Parachute Creek chert is predominate on the site.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1166 (see Maps 3 and 20)**

Site consists of a dispersed lithic scatter located in and near a shallow drainage at the bottom of a steep hill. Artifacts include Parachute Creek chert debitage in all stages of lithic tool manufacture and several choppers and scrapers.

**Nat. Register Status: Not Significant**

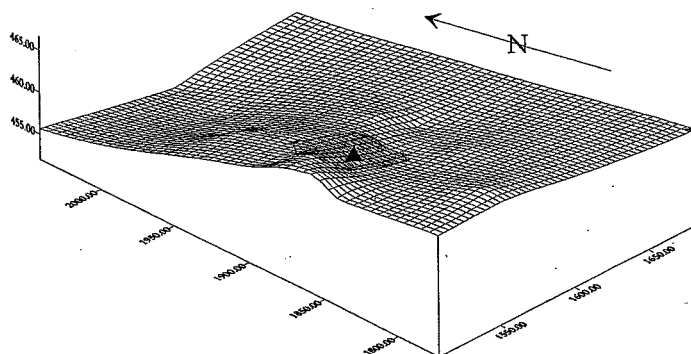
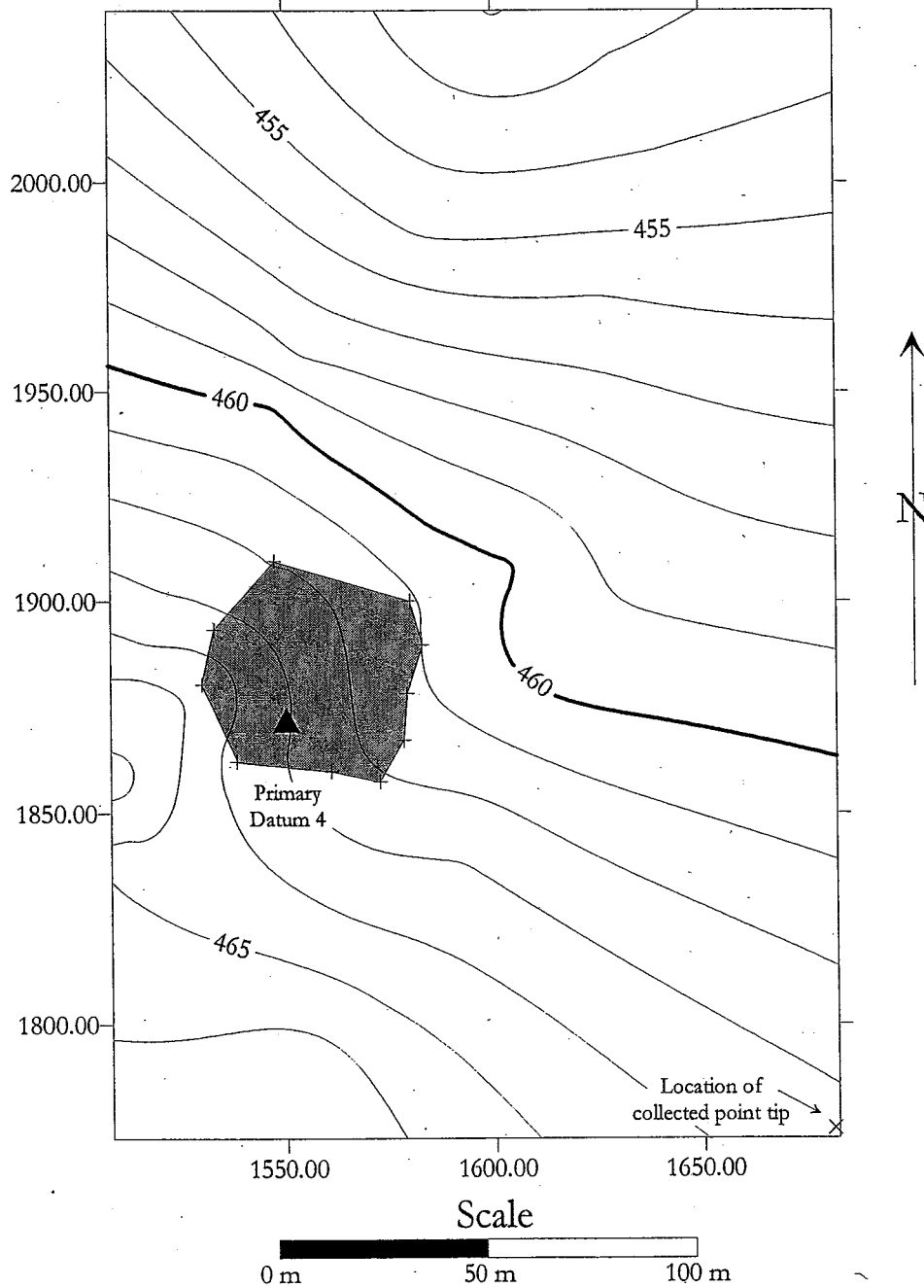
Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**



# MAP 17: SITE 42DC 1163

28



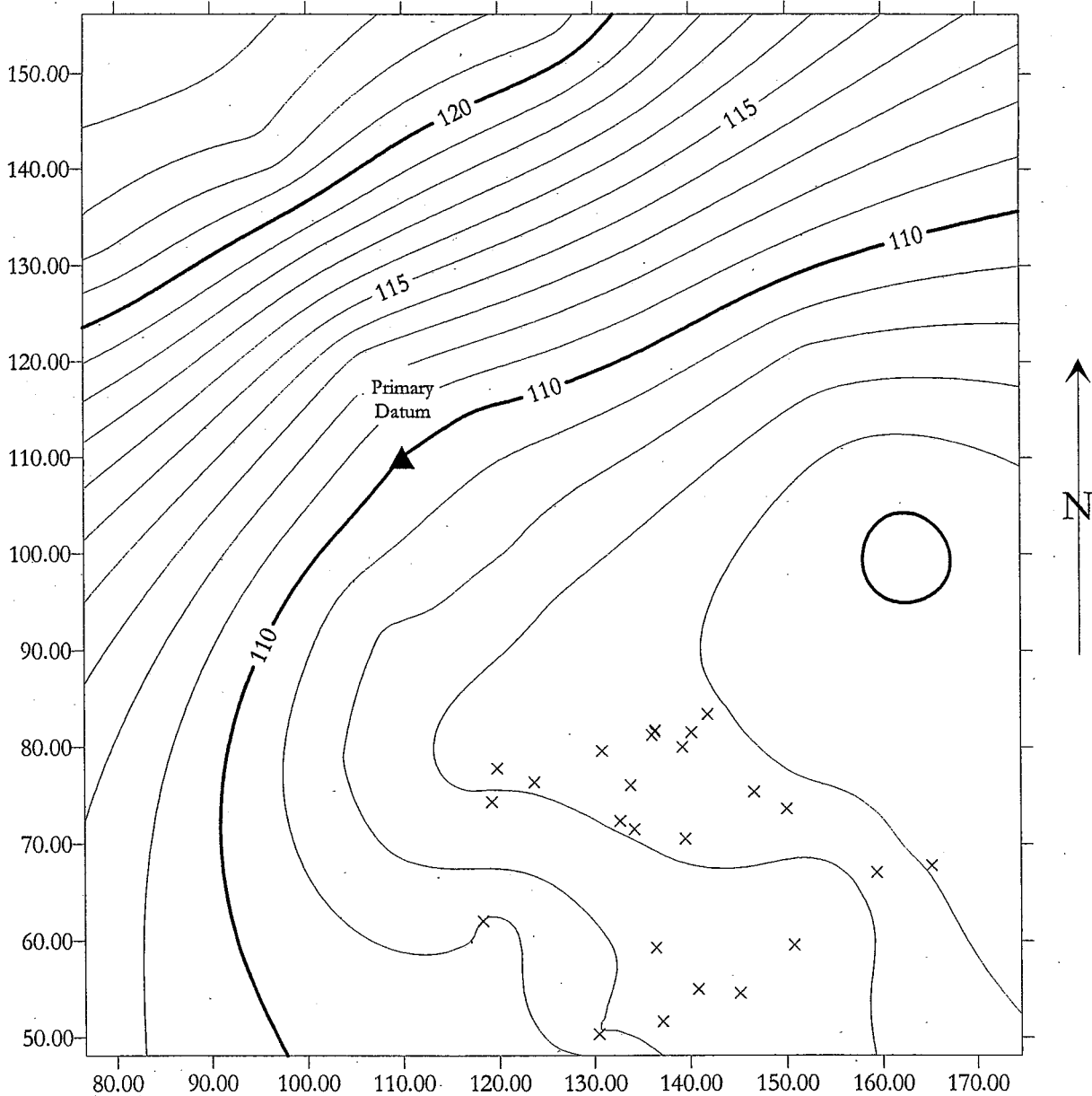
## Legend

- ▲ Datum Location
- × Artifact Location
- Extent of Site

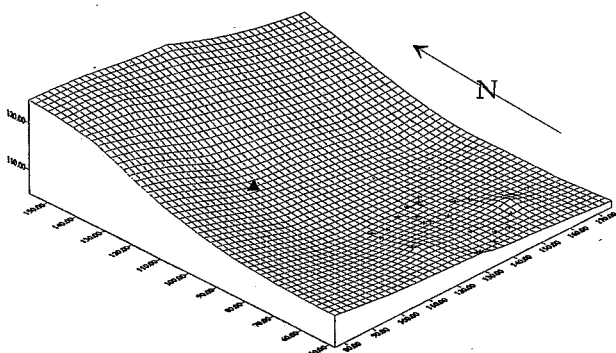
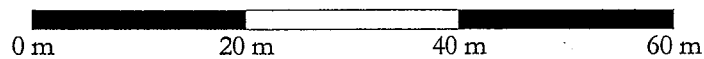


# MAP 18: SITE 42DC 1164

29



Scale



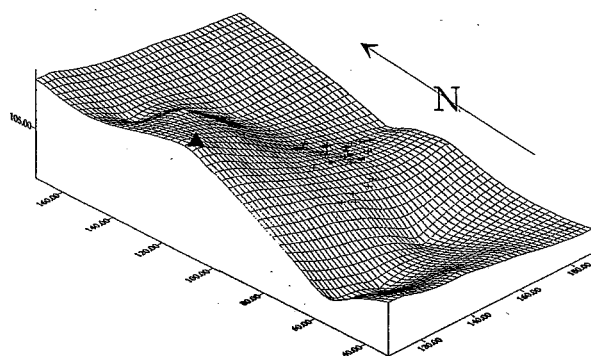
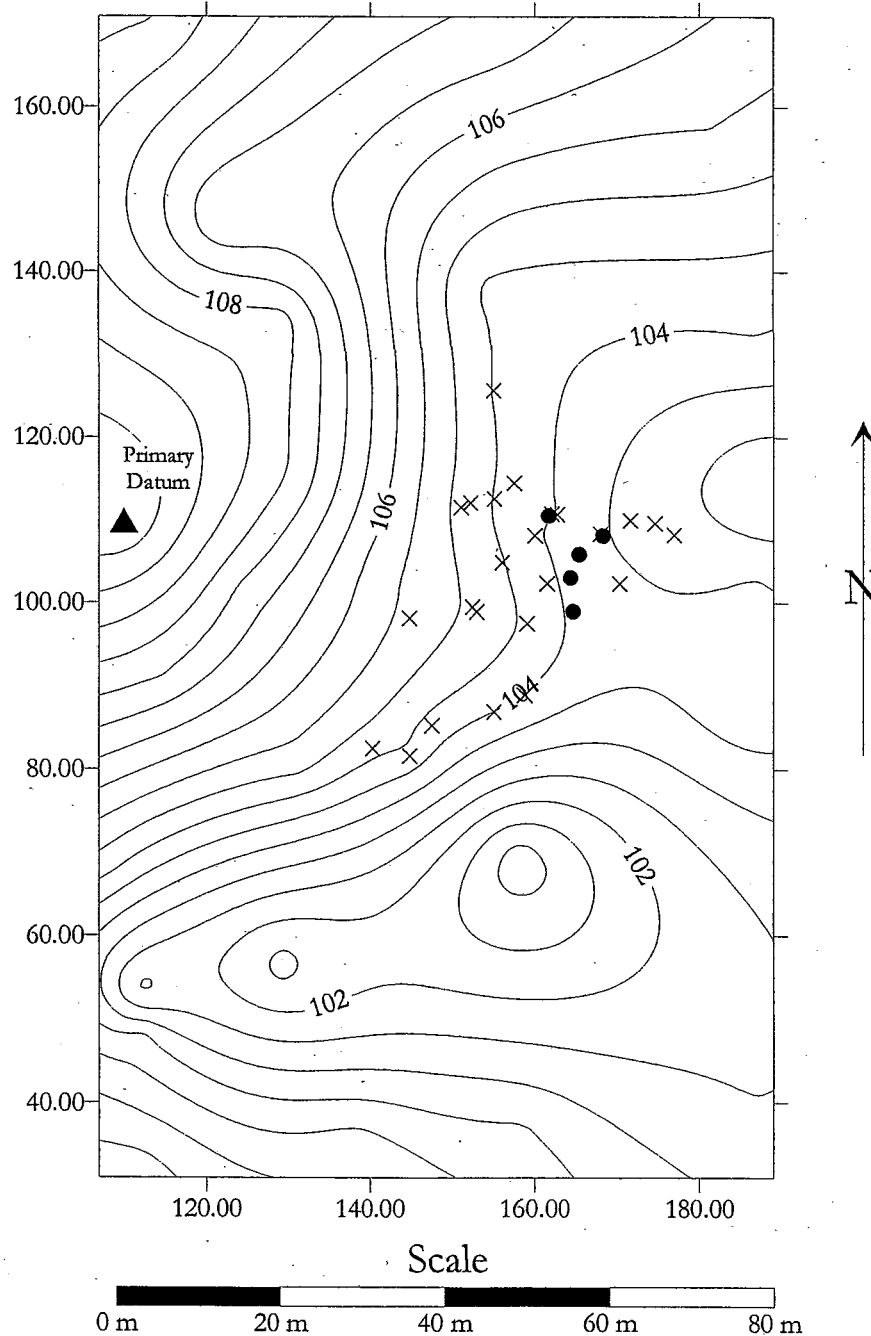
Legend

- ▲ Primary Datum
- × Artifact Location



# MAP 19: SITE 42DC 1165

30



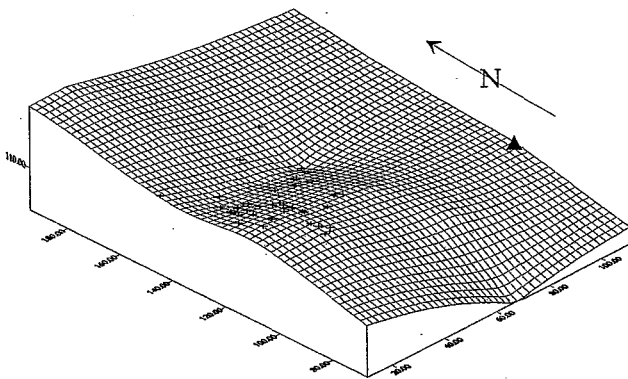
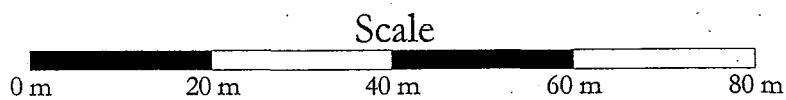
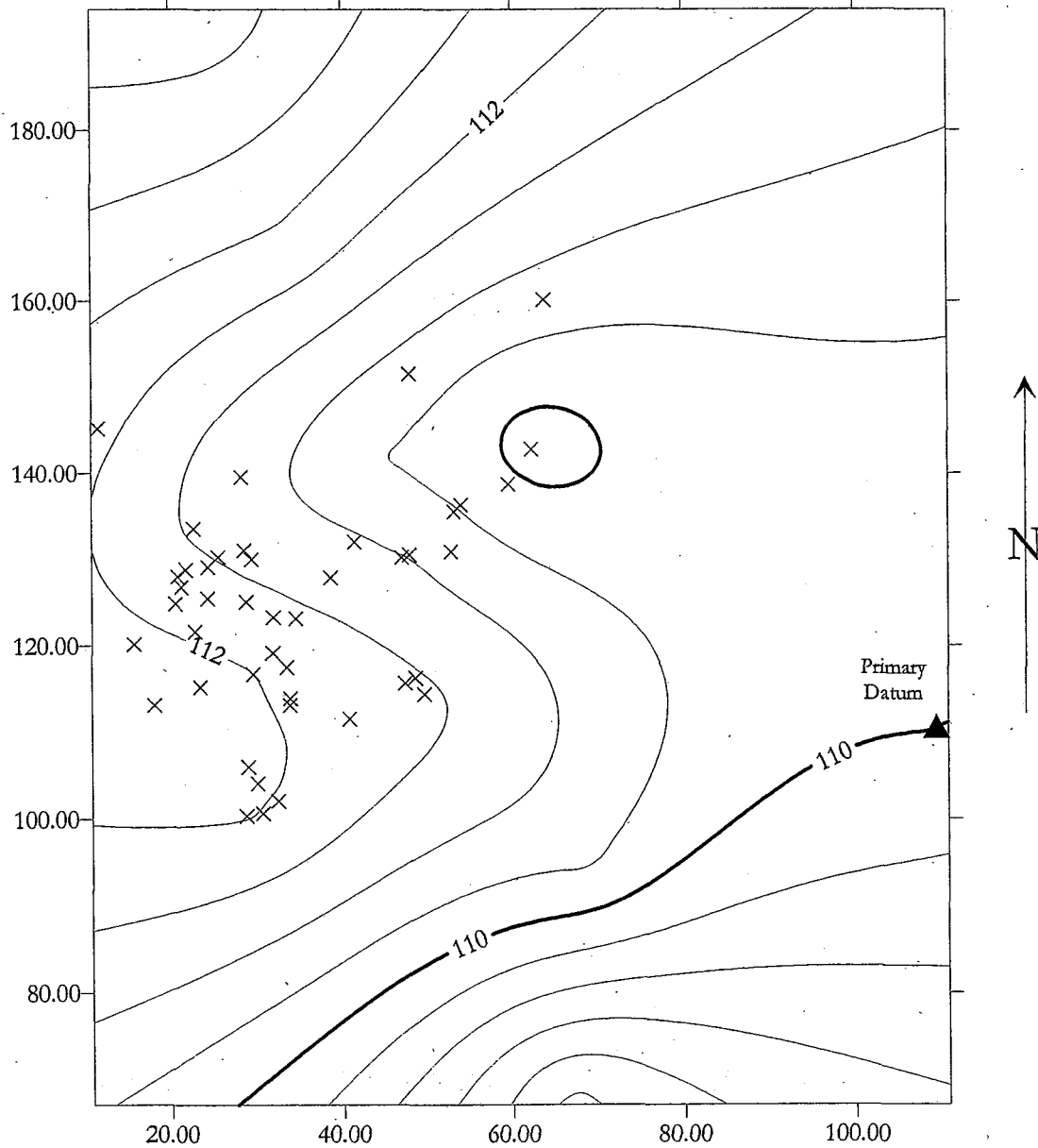
## Legend

- ▲ Primary Datum
- × Artifact Location
- Feature



# MAP 20: SITE 42DC 1166

31



## Legend

- ▲ Primary Datum
- × Artifact Location



**Site 42DC 1171** (see Maps 2 and 21)

Site 42DC 1171 consists of a limited scatter of lithic around and below a low sandstone ledge on a hill slope. Artifacts recorded at the site consist a few flakes of lithic debitage and two discrete concentrations of oxidized sandstone fragments. The site possesses marginal depth potential. No diagnostic artifacts were observed on the site.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1174** (see Maps 5 and 22)

Site consists of an open occupation and lithic scatter located on a low bench. Artifacts include an Elko Eared or Pinto dart point (see Figure 3B) and a number of unifaces, bifaces (see Figure 3A), preforms and other tools. Lithic debitage includes waste from all stages of tool manufacture and reduction. The dominant lithic material type is parachute creek chert, which is commonly found in this locality as float. Site 42DC 1174 is probably related with nearby Site 42DC 1175.

**Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 5-22.**

**Site 42DC 1175** (see Maps 6 and 23)

Site consists of a prehistoric lithic scatter located in a sandy swale above the drainage and flood plain. The scatter is roughly elliptical in configuration and very large occupying an area about 200 meters in length. A Rocker Side-notched dart point (see Figure 3C) was collected from the site. This variety of dart point was utilized during the Middle Archaic stage of occupation on the Colorado Plateau and Wasatch Plateau. No features were observed or recorded on this site. Isolate 1598R/x1 (see Figure 5D), an early Paleoindian projectile point probably of the Midland variety, was collected outside this site's northern periphery. Site 42DC 1175 is probably related with nearby Site 42DC 1174.

**Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 5-22.**

**Site 42DC 1176** (see Map 6)

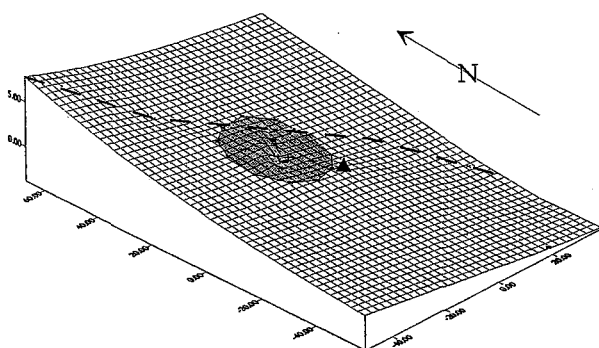
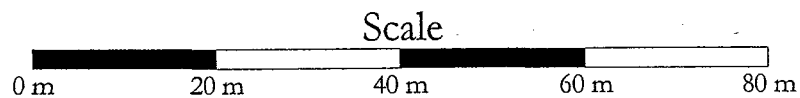
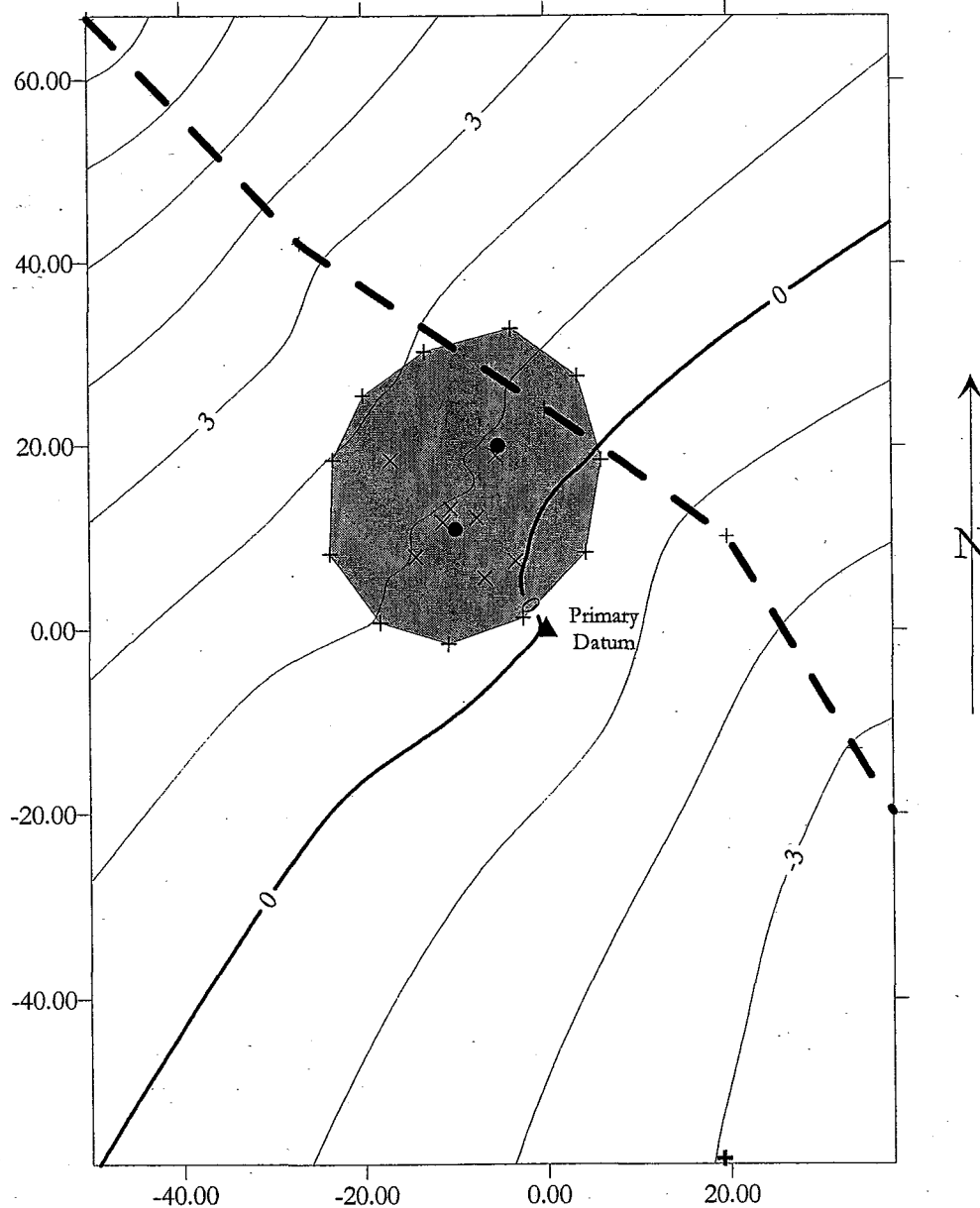
Site consists of a small lithic scatter situated on the south bench above a large ephemeral drainage. The scatter is composed of five flakes and four expediency tools all of which probably represent a single use locus. No features were noted.

**Nat. Register Status: Not Significant**



# MAP 21: SITE 42DC 1171

33

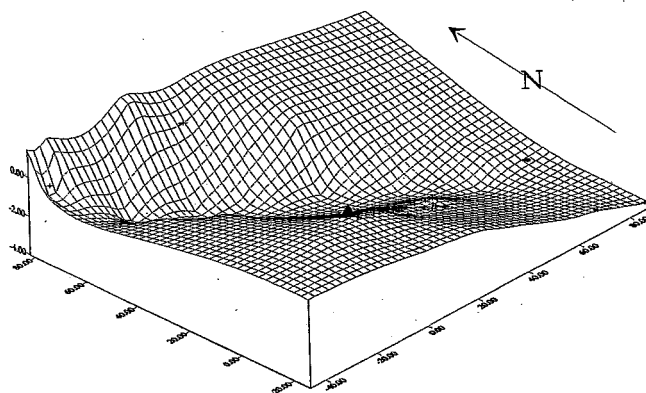
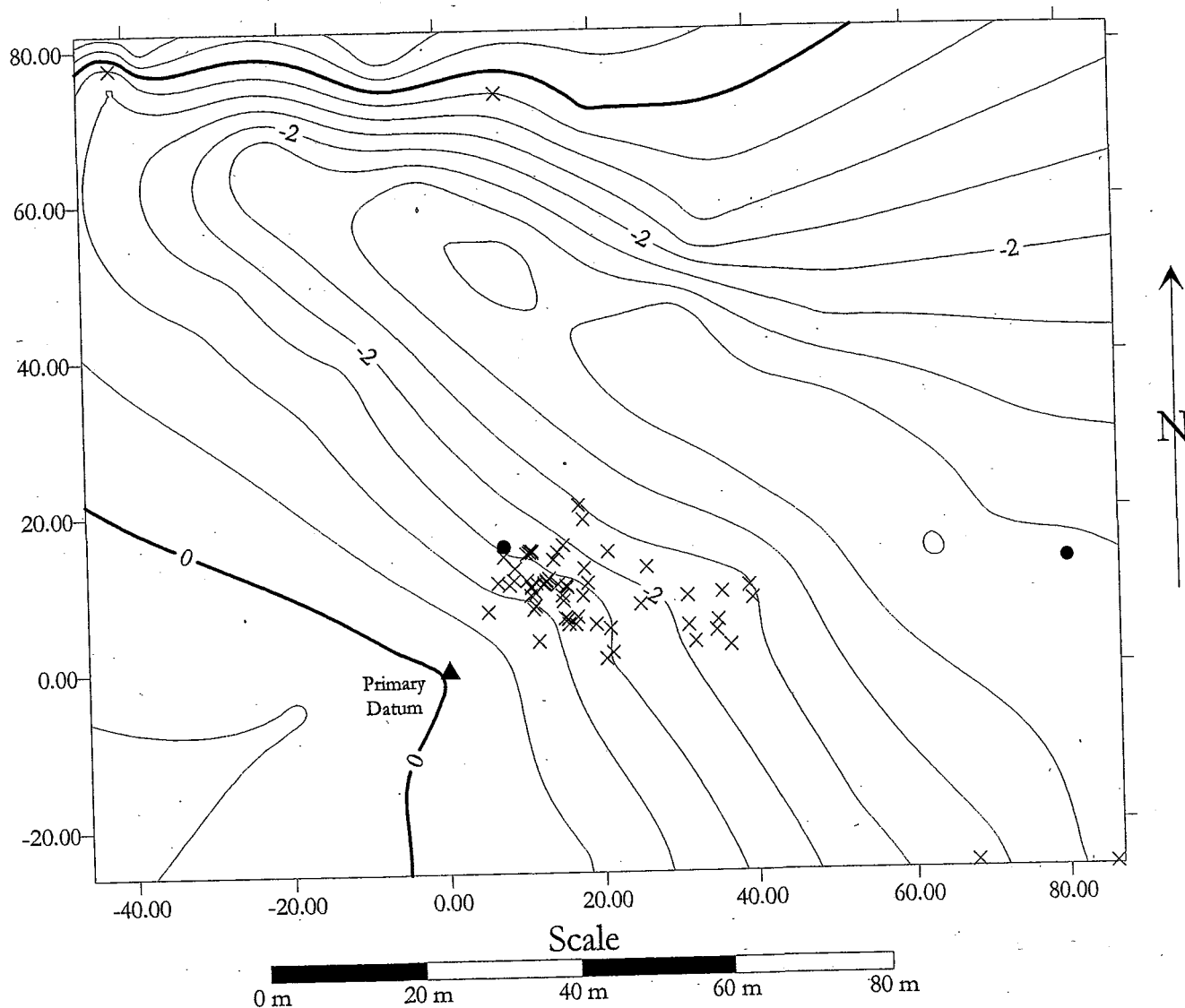


## Legend

- ▲ Primary Datum
- × Artifact Location
- Hearth
- ⊕ Well-head Location
- - - Access Road
- Extent of Site



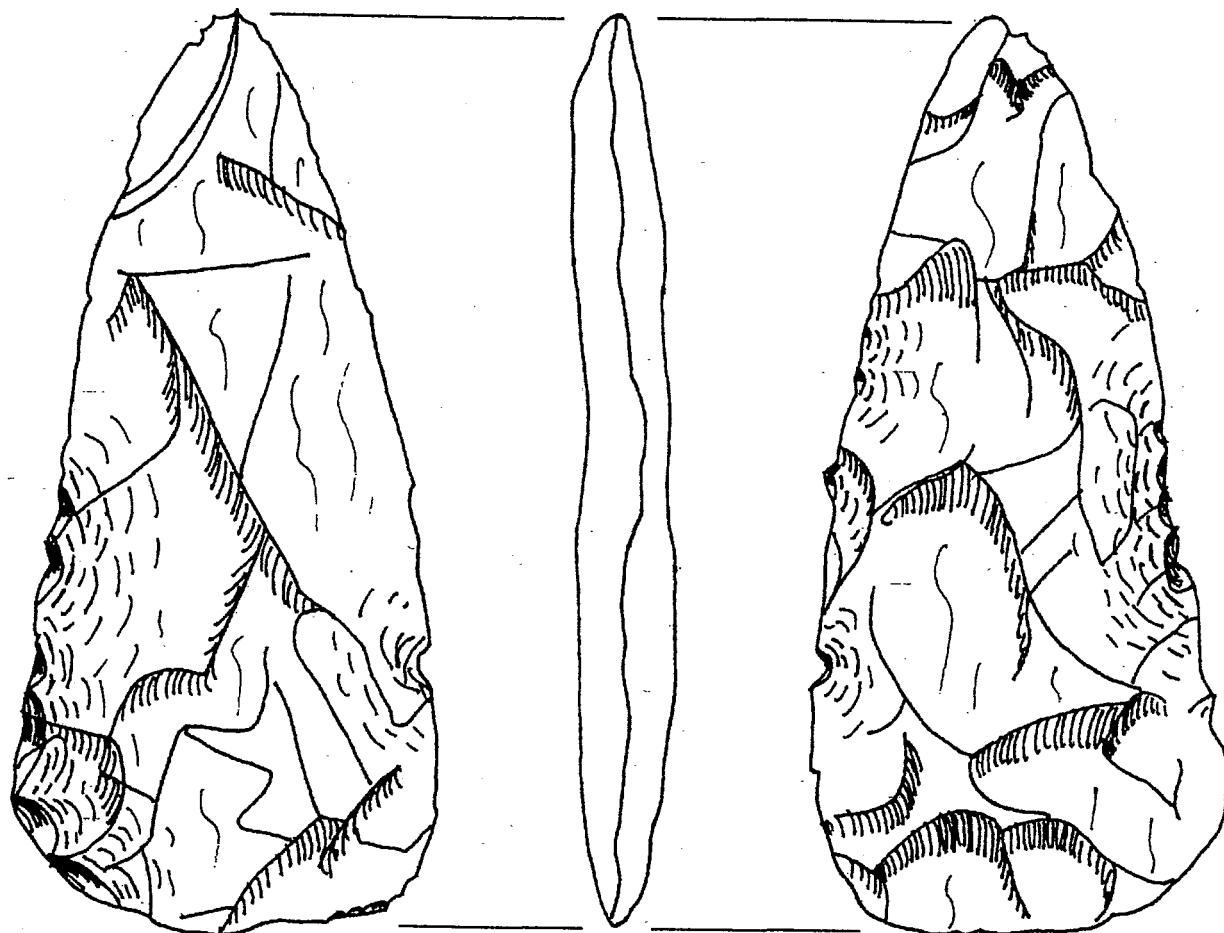
# MAP 22: SITE 42DC 1174



## Legend

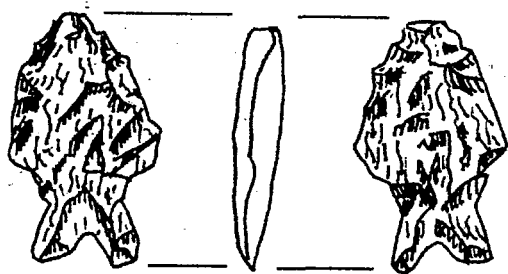
- ▲ Primary Datum
- × Artifact Location
- Hearth





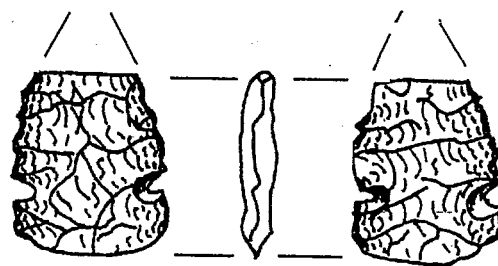
**A**

**42DC 1174  
(FS-1033)**



**B**

**42DC 1174  
(FS-1002)**



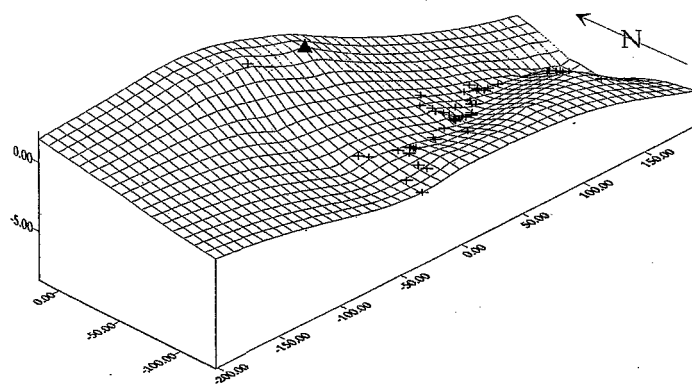
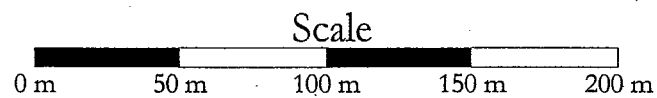
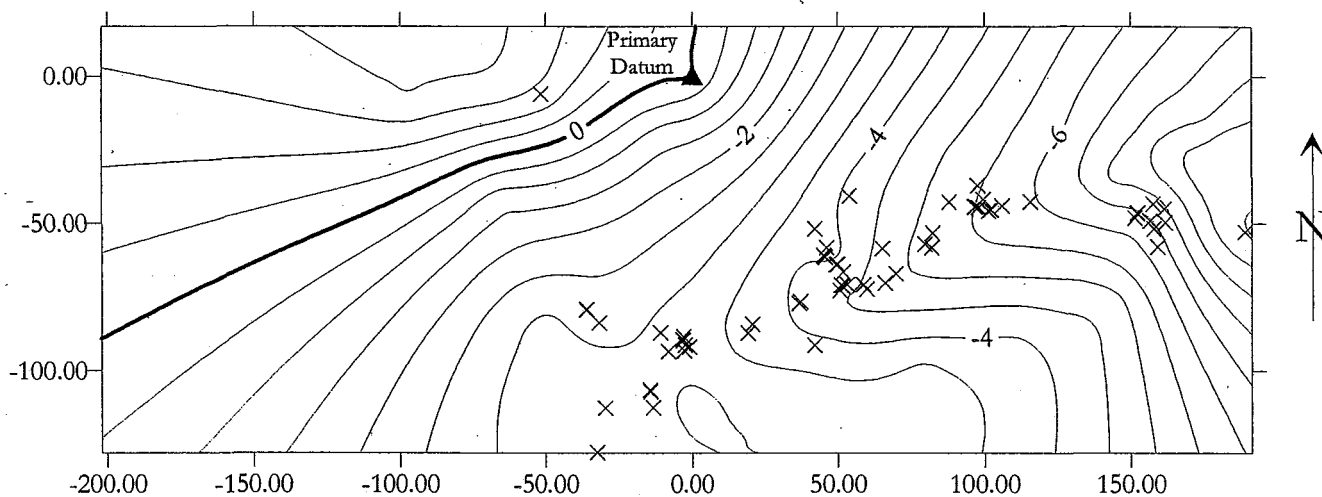
**C**

**42DC 1175  
(FS-1038)**

**FIGURE 3**



## MAP 23: SITE 42DC 1175



### Legend

- ▲ Primary Datum
- × Artifact Location



Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42DC 1177 (see Maps 4 and 24)**

This site consists of a dispersed lithic scatter of Parachute Creek Chert flakes, all highly patinated, lying on an eroded, hardpan clay, surface between a major drainage on the north and the stabilized dune complex associated with the mesa above and to the south. Debitage is mainly primary and secondary flakes of the tap and test or expediency tool manufacture variety.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42UN 2532 (see Map 4)**

The site consists of a diffuse scatter of lithicdebitage, cores and bifaces or choppers. The majority of artifacts are of the tap-and-test variety of cores and primary flakes. The entire site area, which covers about 50 to 60 acres, is littered with artifacts and lithic materials and may have served as a lithic resource locus for the area.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42UN 2533 (see Maps 4 and 25)**

This site consists of a diffuse scatter of lithicdebitage, cores, one biface and numerous scatters of oxidized and fire cracked rock. Two discreet, deflated hearth scatters were noted. Mostdebitage was noted in blowouts in thin sand deposits over bedrock. Some artifacts appear to be in original context, but little depth was noted.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

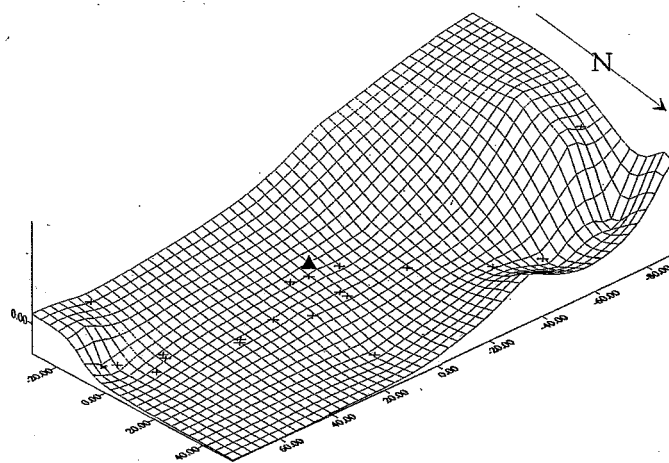
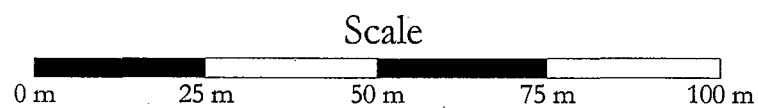
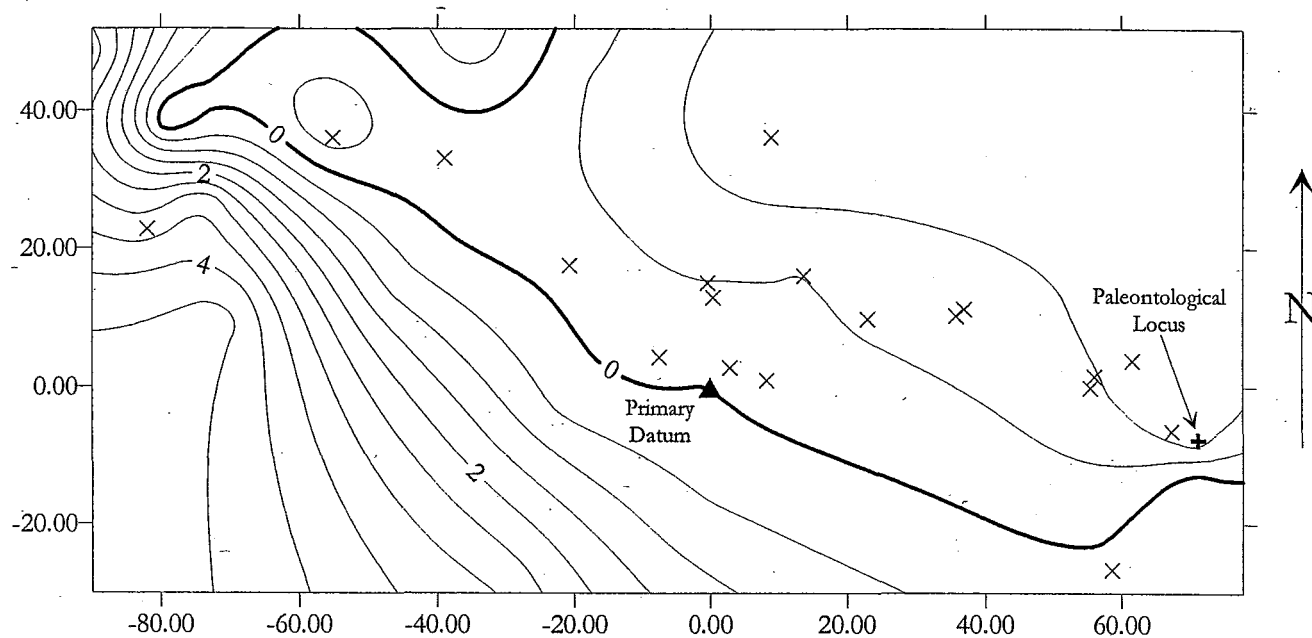
**Recommendation: Avoidance.**

**Site 42UN 2534 (see Maps 4 and 26)**

The site consists of a shallow rock shelter/alcove with a scatter of oxidized stone leading from the shelter across a sandstone ledge bench. A diffuse scatter of lithicdebitage, cores and bifaces or choppers also extends from the shelter area to the lip of the ledge. Erosion has removed all of the shelter deposits, and little of the bench contexts are intact. This site is part of an Archaic



# MAP 24: SITE 42DC 1177



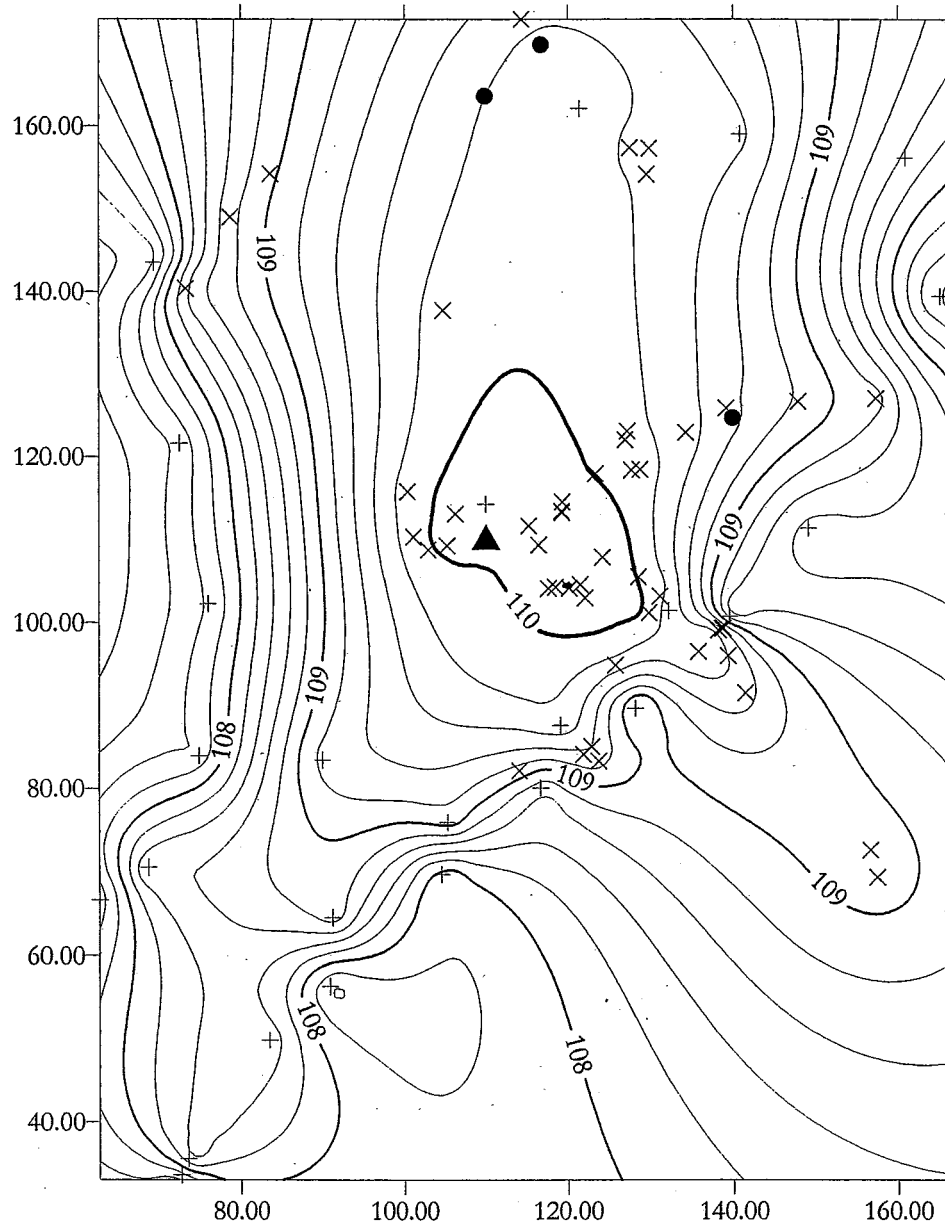
## Legend

- ▲ Primary Datum
- × Artifact Location
- + Paleontological Locus



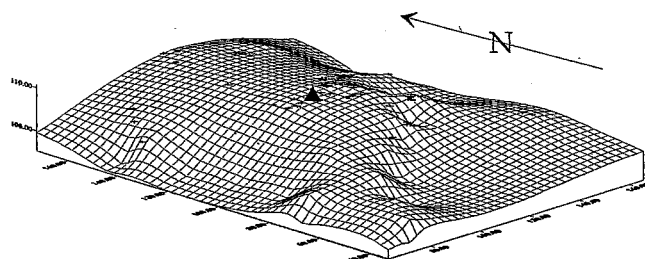
# MAP 25: SITE 42UN 2533

39



Scale

0 m 20 m 40 m 60 m 80 m



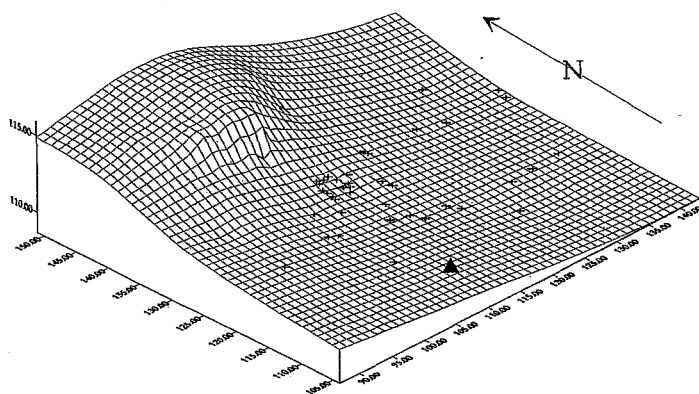
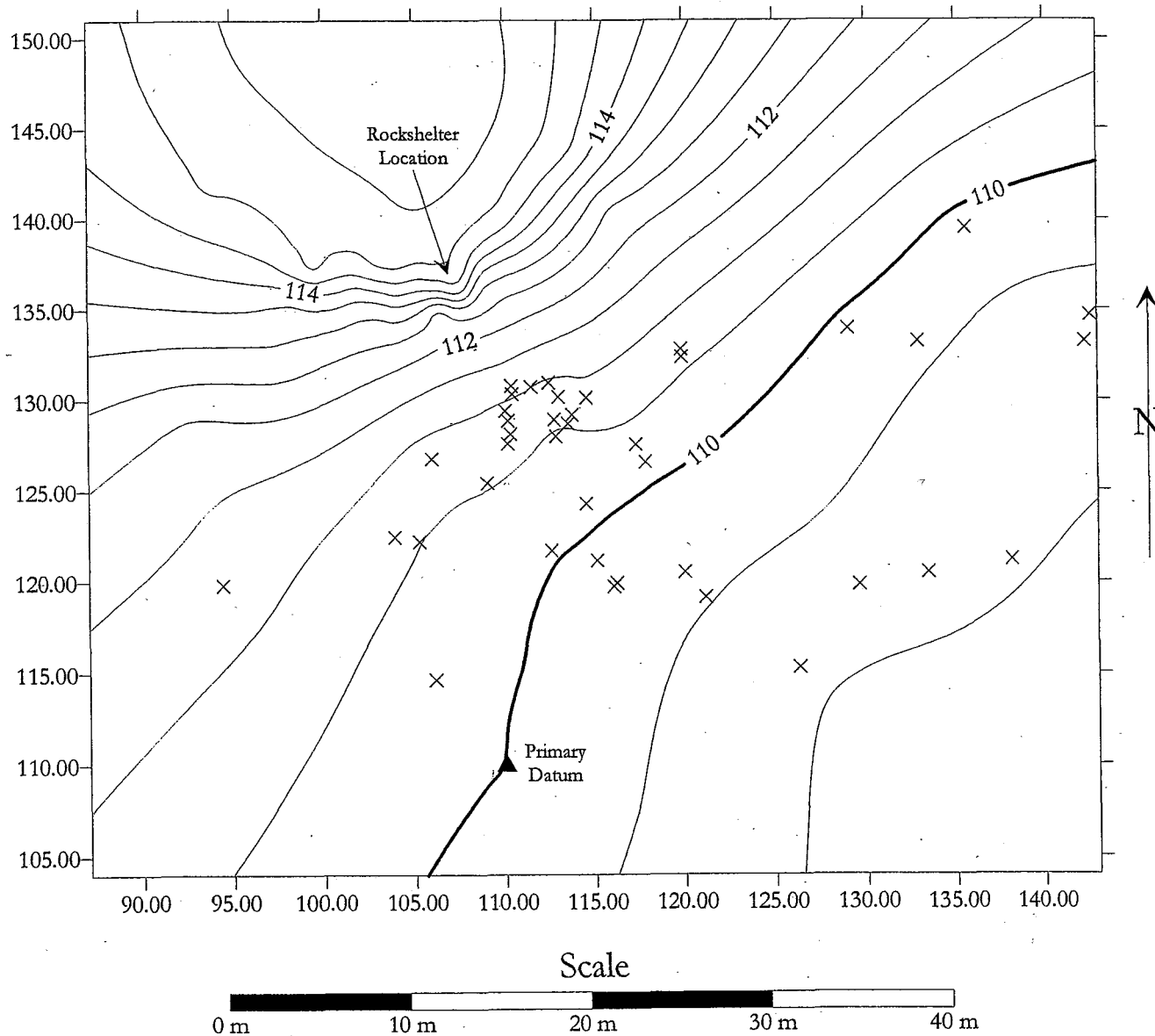
## Legend

- ▲ Primary Datum
- × Artifact Location
- Hearth



# MAP 26: SITE 42UN 2534

40



## Legend

- ▲ Primary Datum
- × Artifact Location



large game hunting/kill/butchering/roasting complex that includes 42UN 2535, 2536, and 2537.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

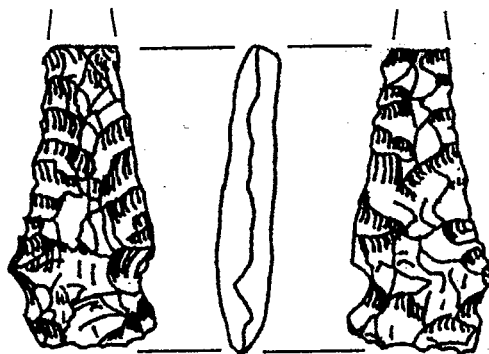
**Site 42UN 2535 (see Maps 4 and 27)**

The site consists of a lithic scatter containing chipped stone tools and debitage. There are spatially delimited concentrations of tools, secondary flakes and tertiary flakes, while decortication flakes, cores and choppers are diffuse throughout the site. The primary lithic material is Parachute Creek chert with some quartzite and a fine grained grey chert. Most artifacts are heavily patinated, suggesting great age. Preliminary evaluations suggest that this is a special use site such as a kill/butcher locus since artifacts are so tightly clustered with most of the bifaces concentrated in a small (2 x 2 meter) areas. This site is part of an Archaic large game hunting/kill/butchering/roasting complex that includes 42UN 2534, 2536, and 2537.

**Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 7-35.**



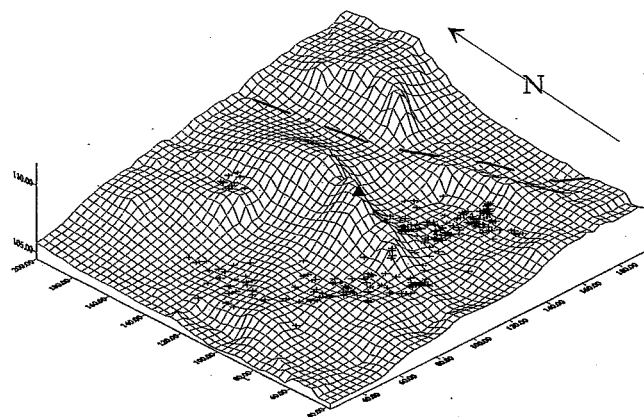
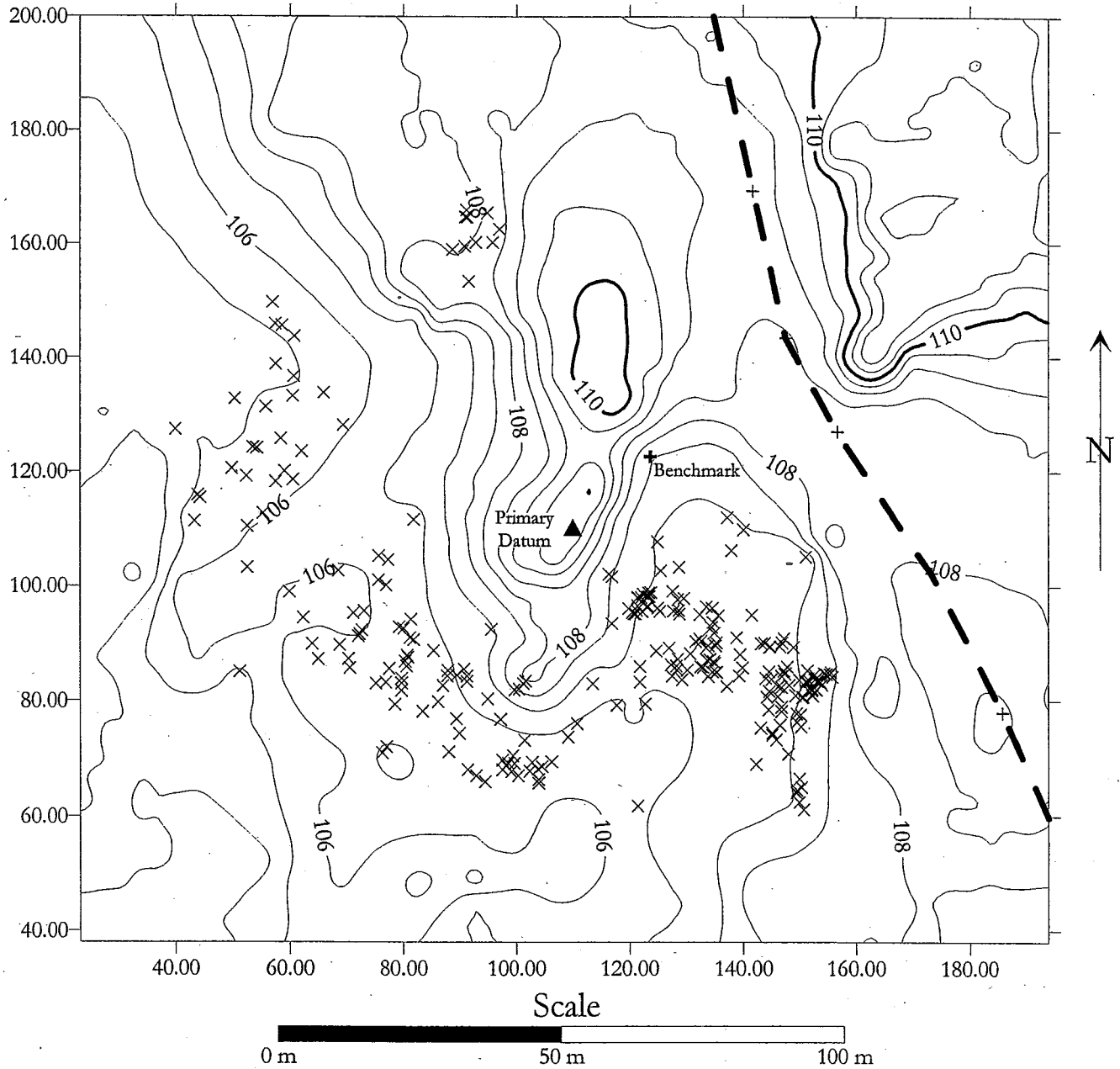
42UN 2535

**FIGURE 4**



# MAP 27: SITE 42UN 2535

42



## Legend

- ▲ Datum Location
- × Artifact Location
- ⊕ Benchmark
- - - Access Road



**Site 42UN 2536** (see Maps 4 and 28)

The site consists of a lithic scatter containing chipped stone tools and debitage. The primary lithic material is Parachute Creek chert with some quartzite and a fine grained brown chert. Several chopping tools are present, but no diagnostics were observed. This site is part of an Archaic large game hunting/kill/butchering/roasting complex that includes 42UN 2534, 2535, and 2537.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Site 42UN 2537** (see Maps 4 and 29)

This site is an open occupation and lithic scatter consisting of several concentrations of oxidized stone, one intact roasting hearth, and a diffuse scatter of lithic debitage, cores and bifaces or choppers. Occupational debris is revealed in a linear pattern in blowouts within and alongside a large dune field. This site is part of an Archaic large game hunting/kill/butchering/roasting complex that includes 42UN 2534, 2535, and 2536.

**Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Units 1-35, 2-35, and 7-35.**

**Site 42UN 2538** (see Maps 4 and 30)

This site consists of a shallow two chambered rock shelter in a sandstone outcrop overlooking a broad drainage to the south. Erosional activity has scoured the shelter, but plenty of debitage, tools and oxidized, heat-cracked rock are visible on the slope and eroding from the sand dunes below.

**Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 9-35.**

**Site 42UN 2552** (see Maps 4 and 31)

This site consists of a rock shelter in a sandstone ledge complex overlooking a broad drainage to the south. Erosional activity has resulted in the collapse of much of the roof over the shelter effectively sealing the context. Reduction debitage and tools are being exposed within the rock shelter and its associated deposition area.

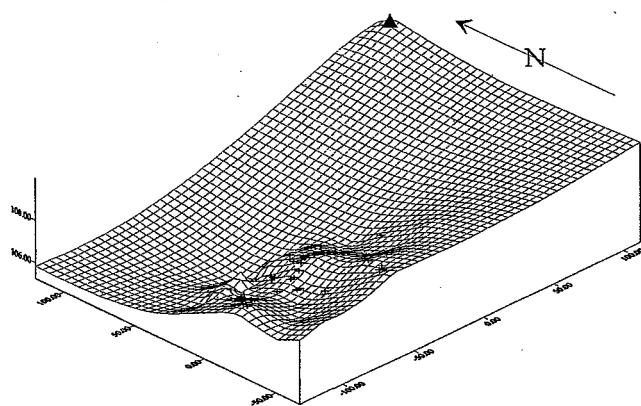
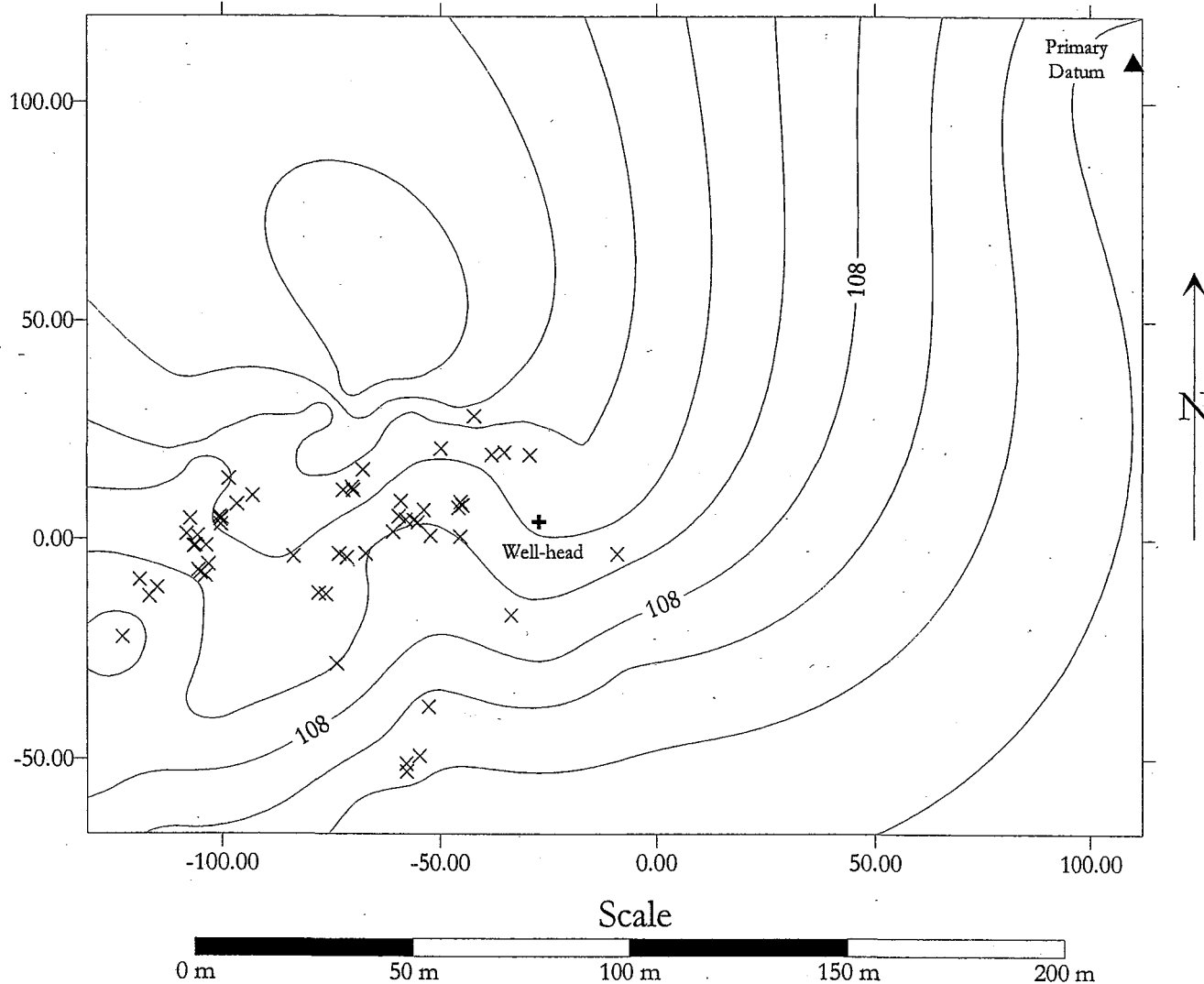
**Nat. Register Status: Significant**

Justification: Site contains depth potential and context integrity. This site meets the



# MAP 28: SITE 42UN 2536

44

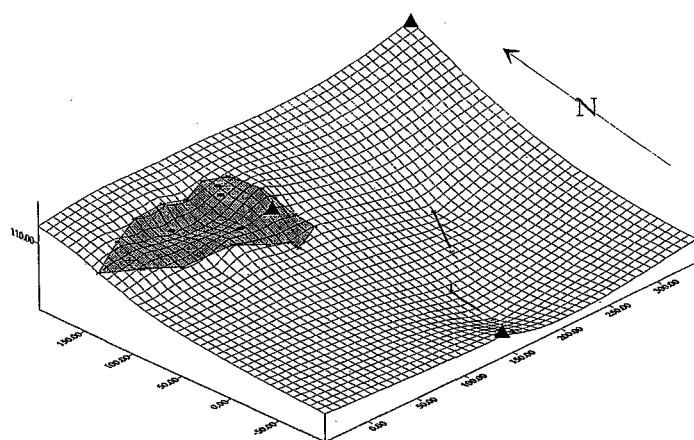
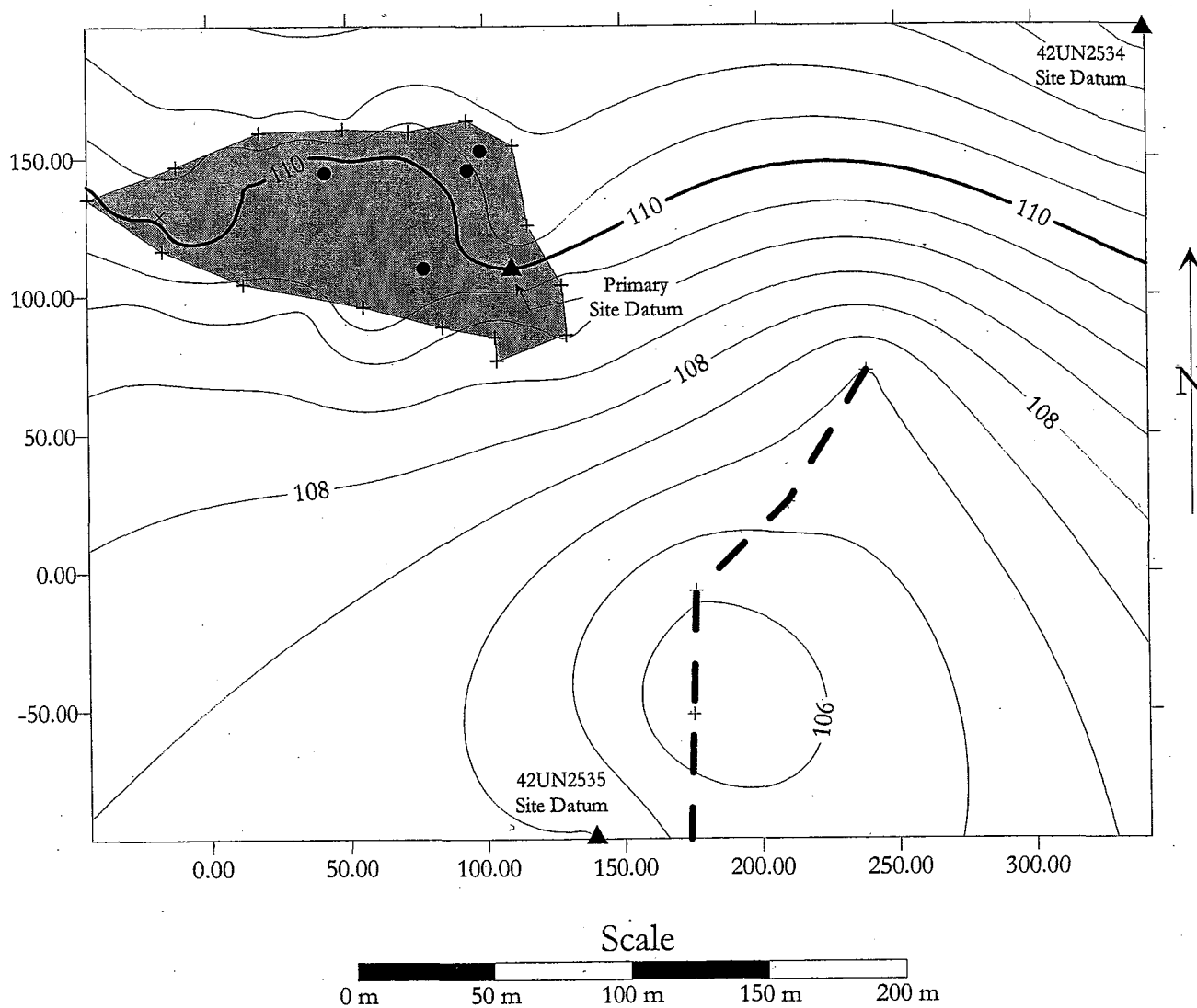


## Legend

- ▲ Primary Datum
- × Artifact Location
- ⊕ Well-head Location



# MAP 29: SITE 42UN 2537



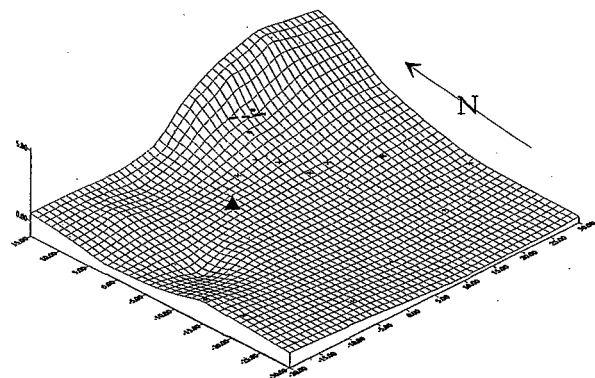
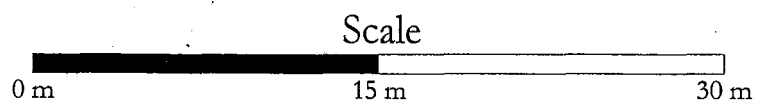
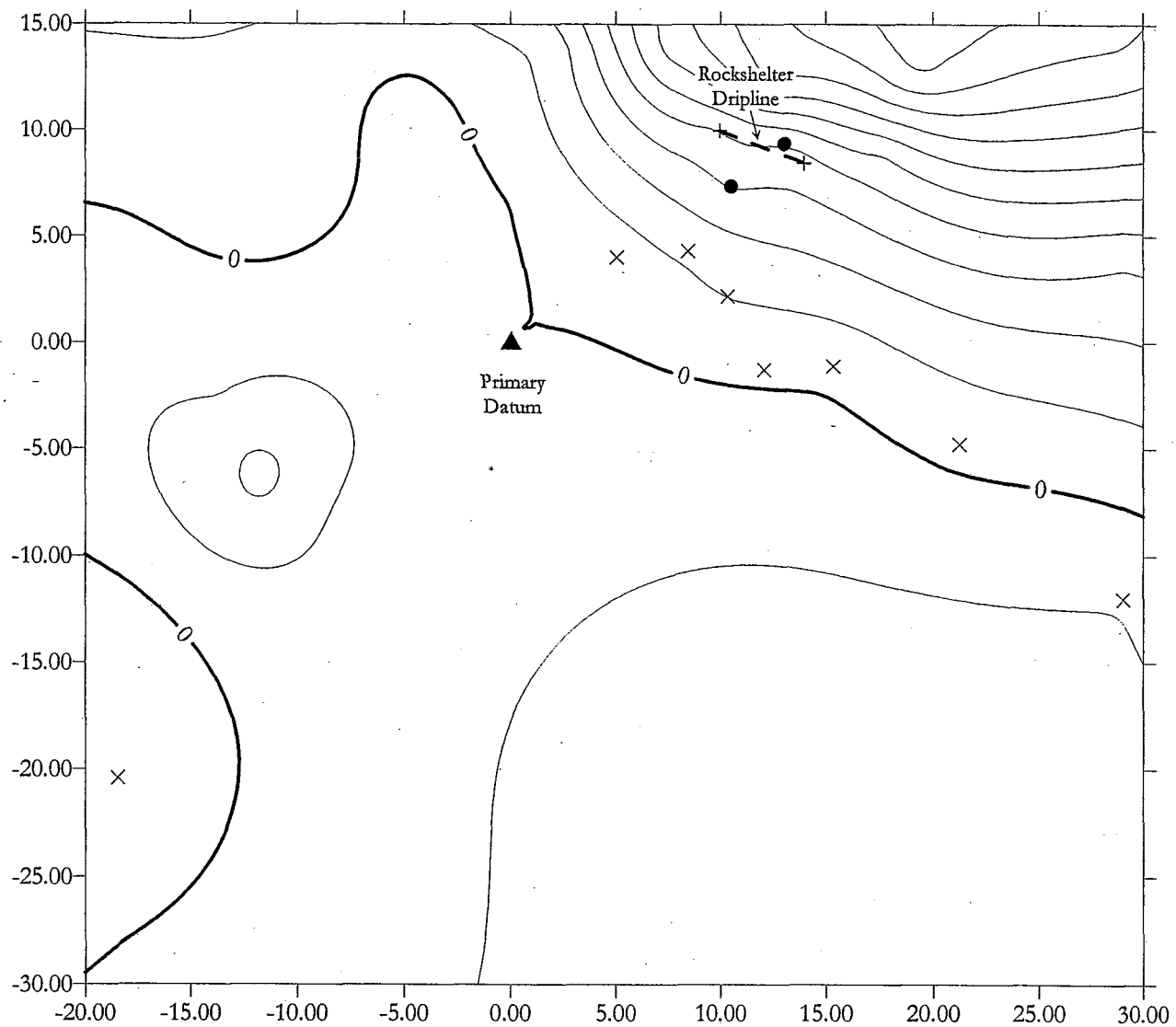
## Legend

- ▲ Datum Location
- × Artifact Location
- Hearth Location
- Extent of Site
- Access Road



# MAP 30: SITE 42UN 2538

46



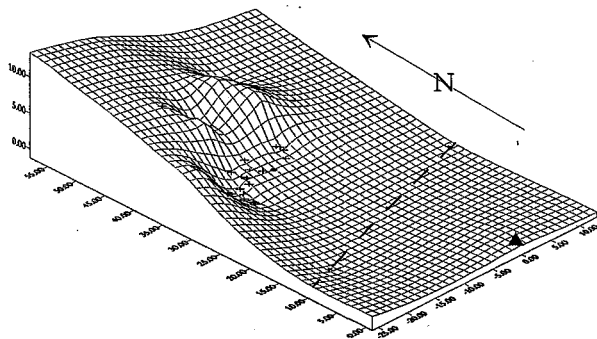
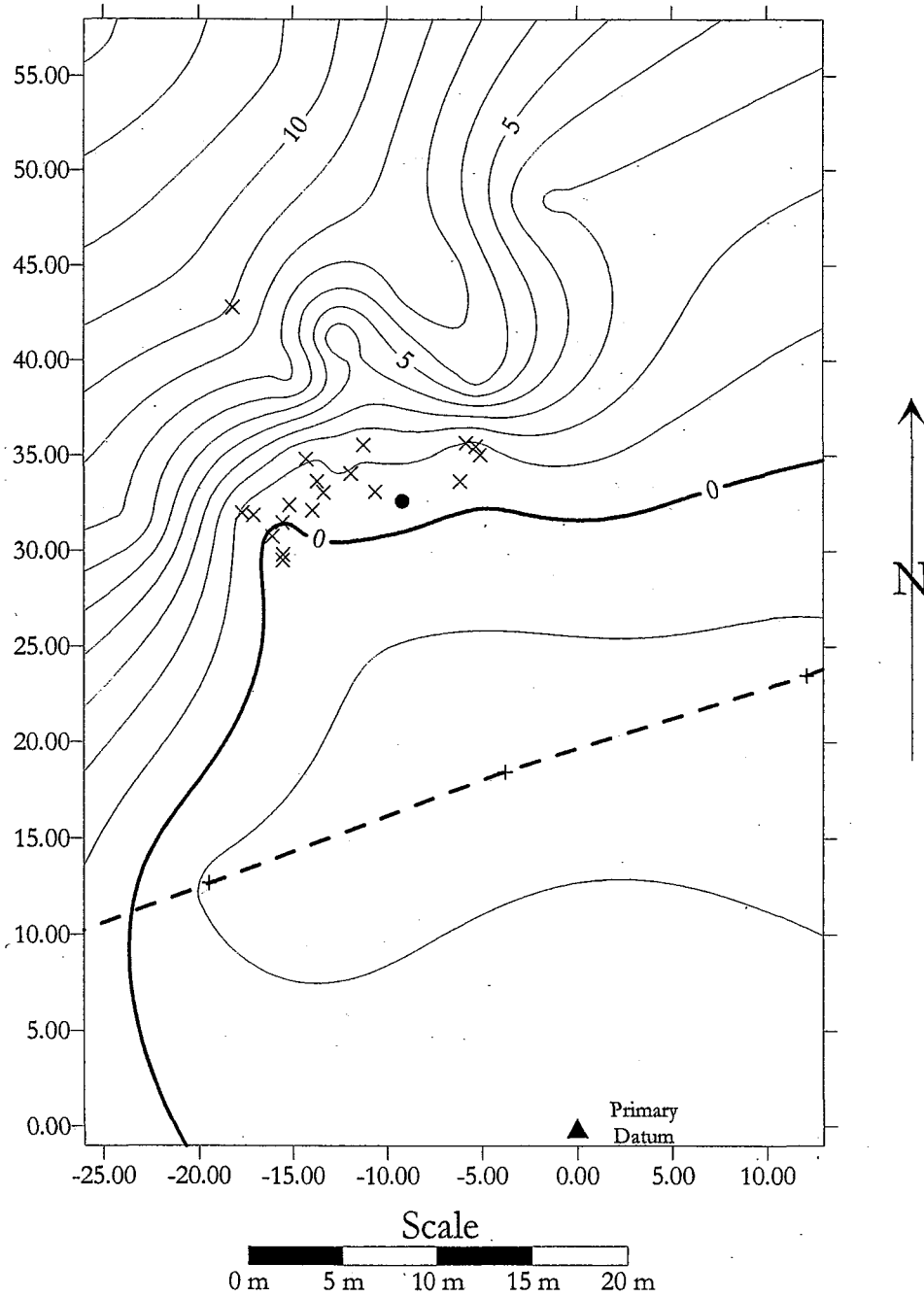
## Legend

- ▲ Primary Datum
- × Artifact Location
- Hearth Location



# MAP 31: SITE 42UN 2552

47



## Legend

- ▲ Primary Datum
- × Artifact Location
- Hearth
- Drainage Channel



standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance during any surface development related to Unit 2-2.**

**Site 42UN 2566** (see Maps 4 and 32)

This site is situated on a bench overlooking a wide drainage to the north. The site consists of a small scatter of lithic debitage, comprised mostly of Parachute Creek Chert, and three tools, also composed of Parachute Creek Chert. A fragment of oxidized sandstone was also noted at the site.

**Nat. Register Status: Not Significant**

Justification: Site lacks depth potential and context integrity. This site does not meet the standards for significance under criterion d established in 36 FR 60.6.

**Recommendation: Avoidance.**

**Isolated Artifacts**

A total of four isolated diagnostic artifacts was observed and recorded during the evaluations within these seven acreage tracts. A number of isolated tap and test flakes and discarded bifaces probably related to butchering episodes was also observed during the inventories; these artifacts were too numerous to warrant reporting.

Isolated artifact **1598B/x1** (see Figure 5A) was collected in the southeast quarter of Section 3, Township 9 South, Range 16 East (see Map 3). It consists of a fragmented Paleoindian projectile point possibly of the Plainview variety. The base is missing so that it is not possible to determine the most pertinent diagnostics for this artifact. It was constructed from tan chert of unknown geological origin.

Isolated artifact **1598K/x2** (see Figure 5B) was collected in the southwest quarter of Section 2, Township 9 South, Range 16 East (see Map 3). It consists of a complete Archaic or late Paleoindian dart point manufactured from dark gray oolitic chert of unknown geological origin.

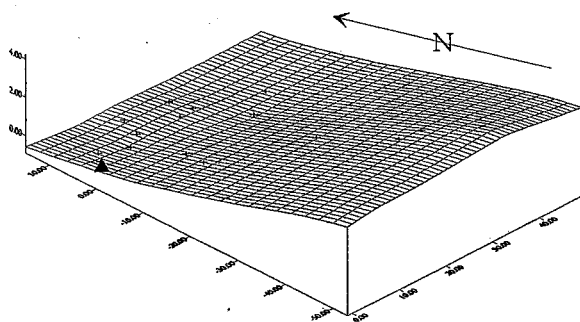
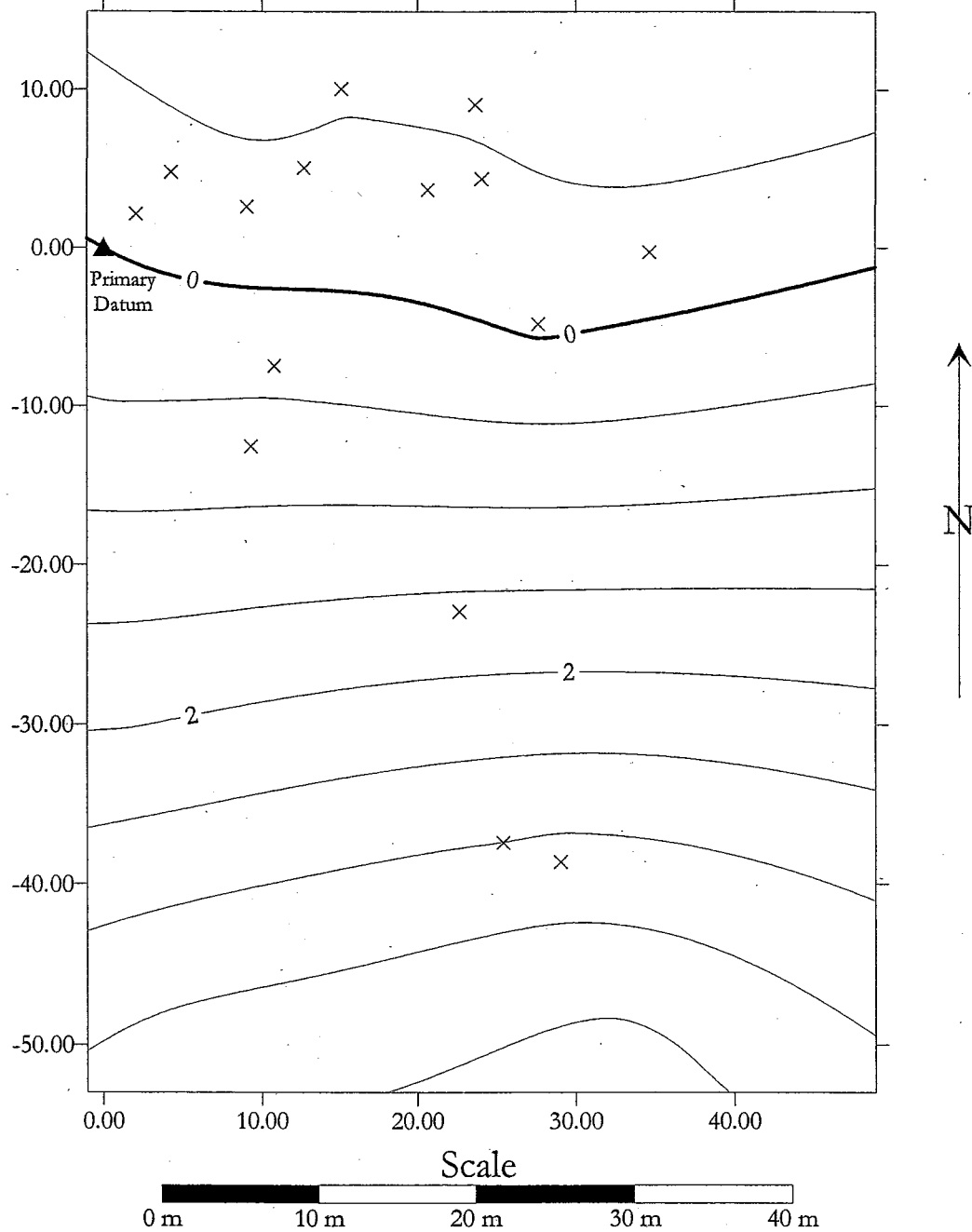
Isolated artifact **1598R/x1** (see Figure 5D) was collected in the northwest quarter of Section 22, Township 9 South, Range 17 East (see Map 6). It consists of the proximal fragment of a highly patinated bifacially prepared tool which may be a Paleoindian projectile point of the Midland type. It was manufactured from locally available Parachute Creek Chert.

Isolated artifact **1598R/x2** (see Figure 5C) was collected in the northeast quarter of Section 22, Township 9 South, Range 17 East (see Map 6). It consists of a nearly intact Pinto dart point of Early Archaic origin. This tool was prepared from either a variant of Parachute Creek Chert or is a type of chert derived from an unknown geological origin.



# MAP 32: SITE 42UN 2566

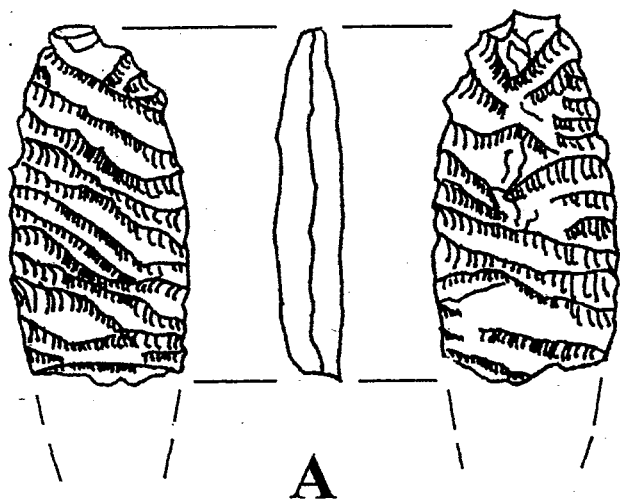
49



## Legend

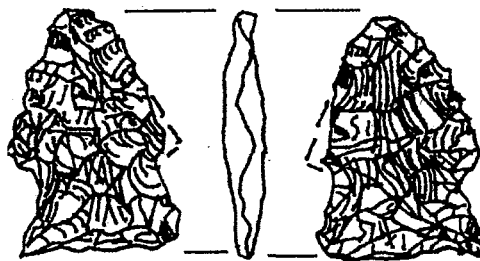
- ▲ Primary Datum
- × Artifact Location





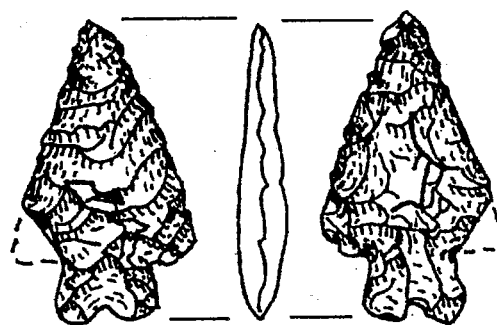
A

1598B/x1

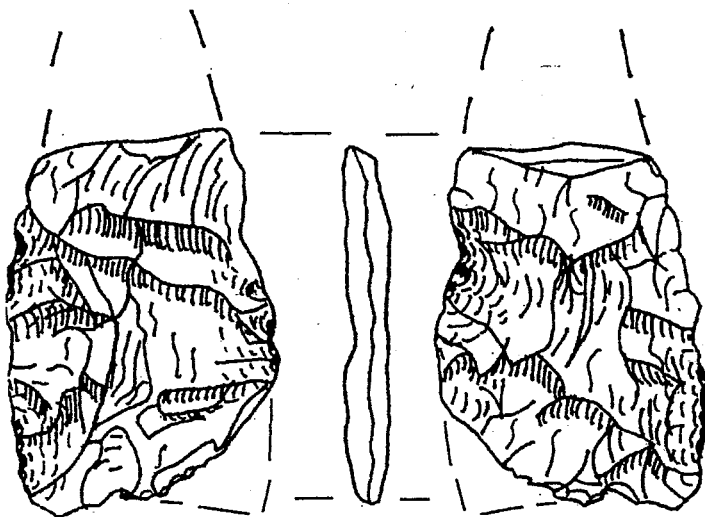


B

1598K/x2



1598R/x2



D

1598R/x1

FIGURE 5



## Paleontological Assessments

Three paleontological loci were observed during the survey. These loci include an intact turtle, mandible fragments from an oreodont, and an intact crocodile mandible. A separate report on these loci has been prepared by Rod Sheetz, consulting paleontologist (see Sheetz 1998).

## DISCUSSION

In any assessment of this type, it is useful to identify the site densities that are apparent in the data. In *ARCHAEOLOGICAL EVALUATIONS OF THE NORTHERN COLORADO PLATEAU* (AERC Paper No. 45), a basic ratio of sites per acre is used to quantify observed densities (cf., Hauck 1991:45). The site:acre ratios noted for Uinta Basin studies in that report begin at 1:050 as recorded during the Texas-Missouri Creek study conducted by Gordon and Kranzush (Gordon, et al. 1983). The high end of the spectrum is a ratio of 1:850 recorded during the U-a and U-b Oil shale lease study (Berry and Berry 1976). These various ratios were ranked as I, II, III, and IV. The rank density of I ranged between 1:32 and 1:78 ratios. Rank II ratios ranged between the ratios 1:97 and 1:132. Rank III ratios were between 1:201 and 1:273. Finally, the rank IV ratios were between 1:327 and 1:540.

With 28 sites reported in the 3,919 acres reported herein, a basic ratio of 1 site per 139.9 acres is identified, or 1:140, for the entire project area. This ratio is associated with the low end of rank II densities. It is comparable with the 1:152 ratio generated during AERC's 1989 inventory in the Red Wash locality to the east (Hauck, et al. 1990) but less dense than the 1:110 ratio defined during AERC's Mapco sample inventories in this general locality (Hauck and Norman 1980).

The site density within the Inland study varies from tract to tract. For instance, in the 689 acres evaluated in the Ashley Unit west of Wells Draw, one site is reported. This locality thus exhibits a low density ratio of 1:689 (falling in low end of rank IV) which is significantly less dense than the rank II ratio of 1:103 identified in the South Wells Draw Unit where 12 sites are reported in 1,240 acres. The two other Units provided ratios closer to the general project mean of 1:140: the Odekirk Springs Unit (12 sites in 1,529 acres) has a ratio of 1:127(rank II), while the South Pleasant Valley Unit (3 sites in 461 acres) exhibits a ratio of 1:154(lower end of rank II).

The site density ratios registered throughout the Inland project area are not the only interesting factor revealed during this study. The number of Paleoindian projectile points recovered from sites and as isolated finds is also very significant. Points having a definite Paleoindian origin are shown as Figures 1A, 1C, 1D, 2B, 5A and 5D. Possible Plano-Early Archaic transitional points include those shown in Figures 1B, 4, and 5B. The remaining diagnostics are mostly derived from Early Archaic contexts and include Figures 2A, 3B, and 5C. Figure 3C is thought to be an Elko Rocker side-notch of Middle Archaic derivation.



If our assessment of these diagnostic artifacts is correct, 46% of the diagnostic points recovered are Paleoindian, and 69% are both definite and possible Paleoindian. Only 30% of the diagnostics are definitely of Archaic derivation--and these are all of Early to Middle Archaic origin. The lack of Late Archaic, Formative (with the exception of the Late Formative pot-drop site, 42DC 1155), and Late Prehistoric (Shoshonean/Ute) in the project area is also very significant. Our assessment is that water and associated flora and fauna were readily available from the late Pleistocene into the early Holocene within this Castle Peak Draw to Pariette Bench locality. Those resources began to diminish by 7,000 years B.P. (before present) during the Early Archaic and were definitely lost by the end of the Middle Archaic or ca. 4,600 years B.P. accounting for the rapid reduction of hunting occupations and sites in this locality after that date. Further research needs to be initiated to address the viability of this hypothesis.

## CONCLUSION AND RECOMMENDATIONS

AERC recommends that a cultural resource clearance be granted to Inland Resources, Inc. relative to the development within these various land parcels based upon adherence to the following stipulations:

1. Sites 42DC 1149, 1150, 1158, 1159, 1161, 1162, 1174, 1175 and 42UN 2535, 2537, 2538, and 2552 should be avoided during any development within the Inland tracts. These sites are significant resources and should be protected from disturbance and vandalism.
2. all vehicular traffic, personnel movement, construction and restoration operations should be confined to the surveyed zones and to the existing roadways;
3. all personnel should refrain from collecting artifacts and from disturbing any cultural resources in the area; and
4. the authorized official should be consulted should cultural remains from subsurface deposits be exposed during construction work or if the need arises to relocate or otherwise alter the location of the exploration area.



F. Richard Hauck, Ph.D.  
President and Principal  
Investigator



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- 1996g Cultural Resource Evaluation of Ten Proposed Well Locations with Associated Road Complexes in the Castle Peak Draw Locality of Duchesne County, Utah. Report prepared for Inland Production Company, IPC-96-2, Archeological-Environmental Research Corporation, Bountiful.
- 1996h Cultural Resource Evaluation of Five Proposed Monument Federal Well Locations in the Pariette Bench Locality of Uintah County, Utah. Report prepared for Equitable Resources Energy Company, BLCR-96-7, Archeological-Environmental Research Corporation, Bountiful.
- 1996i Cultural Resource Evaluation of 11 Proposed Monument Federal Well Locations in the Wells Draw, Castle Peak Draw, Pleasant Valley, & Pariette Bench Localities of Duchesne County, Utah. Report prepared for Equitable Resources Energy Company, BLCR-96-2, Archeological-Environmental Research Corporation, Bountiful.
- 1997a Cultural Resource Evaluation of Seven Proposed Well Locations With Associated Road Corridors in the Wells Draw Locality of Duchesne County, Utah. Report prepared for Inland Production Company, IPC-97-1, Archeological-Environmental Research Corporation, Bountiful.
- 1997b Cultural Resource Evaluation of Proposed North Ashley Unit No. 7-1 in the Well Draw Locality of Duchesne County, Utah. Report prepared for Inland Production Company, IPC-97-1A, Archeological-Environmental Research Corporation, Bountiful.



- 1997c Cultural Resource Evaluation of Proposed Ashley Federal Units 6-1 and 11-1 in the Wells Draw Locality of Duchesne County, Utah. Report prepared for Inland Production Company, IPC-97-3, Archeological-Environmental Research Corporation, Bountiful.
- 1998a Cultural Resource Evaluations of Proposed Well Locations in the South Wells Draw Unit, South Pleasant Valley Unit, and Odekirk Springs Lease Areas in the Wells Draw, Pariette Bench, and Castle Peak Draw Localities in Duchesne and Uintah Counties, Utah. Report prepared for Inland Production Company, IPC-98-1, Archeological-Environmental Research Corporation, Bountiful.
- 1998b Cultural Resource Evaluation of a Series of Potential Drilling Localities in the Castle Peak Draw Locality of Duchesne and Uintah Counties, Utah. Report prepared for Inland Resources, Inc., IPC-98-2, Archeological-Environmental Research Corporation, Bountiful.
- 1998c Cultural Resource Evaluation of a Series of Potential Drilling Localities in the Castle Peak Draw — Pariette Bench Localities of Duchesne and Uintah Counties, Utah. Report prepared for Inland Resources, Inc., IPC-98-3a, Archeological-Environmental Research Corporation, Bountiful.
- 1998d Cultural Resource Evaluation of 16 Proposed Inland Units in the South Wells Draw — Castle Peak Draw — Pariette Bench Localities of Duchesne and Uintah Counties, Utah. Report prepared for Inland Resources, Inc., IPC-98-3b, Archeological-Environmental Research Corporation, Bountiful.
- 1998e Cultural Resource Evaluation of Various Large Tracts in the Wells Draw to Pariette Bench Locality in Duchesne and Uintah Counties, Utah. Report prepared for Inland Resources, Inc., IPC-98-4, Archeological-Environmental Research Corporation, Bountiful.
- 1998f Cultural Resource Evaluation of Two Tracts for Proposed Inland Units in the Wells Draw Locality of Duchesne County, Utah. Report prepared for Inland Resources, Inc., IPC-98-5, Archeological-Environmental Research Corporation, Bountiful.

Hauck, F. Richard and Glade Hadden

- 1993a Cultural Resource Evaluation of Seven Proposed Well Locations in the Monument Buttes Locality of Duchesne County, Utah. Report prepared for Balcron Oil Company, BLCR-93-4, Archeological-Environmental Research Corporation, Bountiful.



- 1993b Cultural Resource Evaluation of Four Proposed Well Locations in the Monument Buttes Locality of Duchesne County, Utah. Report prepared for Balcron Oil Company, BLCR-93-5, Archeological-Environmental Research Corporation, Bountiful.
- 1993c Cultural Resource Evaluation of Eight Proposed Well Locations in the Monument Buttes Locality of Duchesne County, Utah. Report prepared for Balcron Oil Company, BLCR-93-9, Archeological-Environmental Research Corporation, Bountiful.
- 1993d Cultural Resource Evaluation of Four Proposed Well Locations in the Monument Buttes and Pleasant Valley Localities of Duchesne and Uintah Counties, Utah. Report prepared for Balcron Oil Company, BLCR-93-10, Archeological-Environmental Research Corporation, Bountiful.
- 1993e Cultural Resource Evaluation of Seven Proposed Wells in the Monument Buttes and Pleasant Valley Localities of Duchesne and Uintah Counties, Utah. Report prepared for Balcron Oil Company, BLCR-93-11, Archeological-Environmental Research Corporation, Bountiful.
- 1994a Cultural Resource Evaluation of Eight Proposed Wells in the Pleasant Valley Locality of Uintah County, Utah. Report prepared for Balcron Oil Company, BLCR-94-3, Archeological-Environmental Research Corporation, Bountiful.
- 1994b Cultural Resource Evaluation of Proposed Water Injection Line Lateral Segments in the Monument Buttes Locality of Duchesne County, Utah. Report prepared for Balcron Oil Company, BLCR-94-4, Archeological-Environmental Research Corporation, Bountiful.
- 1994c Cultural Resource Evaluation of Proposed Well Locations and Access Routes in the Pariette Draw - Castle Peak Draw - Eight Mile Flat Localities of Duchesne and Uintah Counties, Utah. Report prepared for Balcron Oil Company, BLCR-94-9, Archeological-Environmental Research Corporation, Bountiful.
- 1994d Cultural Resource Evaluation of Proposed Well Locations and Access Routes in the Castle Peak Draw and Eight Mile Flat Localities of Duchesne and Uintah Counties, Utah. Report prepared for Balcron Oil Company, BLCR-94-10, Archeological-Environmental Research Corporation, Bountiful.
- 1994e Cultural Resource Evaluation of Two Proposed Balcron Monument State Well Locations and Access Routed in the Castle Draw Locality of Uintah County, Utah. Report prepared for Balcron Oil Company, BLCR-94-10b, Archeological-Environmental Research Corporation, Bountiful.



- 1994f Cultural Resource Evaluation of Proposed Well Locations and Access Routes in the Monument Buttes and Pleasant Valley Localities of Duchesne and Uintah Counties, Utah. Report prepared for Balcron Oil Company, BLCR-94-11, Archeological-Environmental Research Corporation, Bountiful.
- 1995a Cultural Resource Evaluation of Proposed Well Locations and Access Routes in the Monument Buttes Locality of Duchesne County, Utah. Report prepared for Balcron Oil Company, BLCR-95-1 & 2, Archeological-Environmental Research Corporation, Bountiful.
- 1995b Cultural Resource Evaluation of Nine Proposed Well Locations and Access Routes in the Castle Peak Draw and Eight Mile Flat Localities of Duchesne and Uintah Counties, Utah. Report prepared for Balcron Oil Company, BLCR-95-5, Archeological-Environmental Research Corporation, Bountiful.
- 1995c Cultural Resource Evaluation of a Series of Proposed Water Return Pipeline Routes in the Castle Peak Draw Locality of Duchesne County, Utah. Report prepared for Balcron Oil Company, BLCR-95-7, Archeological-Environmental Research Company, Bountiful.
- 1997 Cultural Resource Evaluation of the Ashley Unit, South Wells Draw Unit and South Pleasant Valley Unit Lease Areas in the Wells Draw & Pleasant Valley Localities in Duchesne County, Utah Report prepared for Inland Production Company, IPC-97-5A, Archeological-Environmental Research Corporation, Bountiful.
- Hauck, F.R. and G. Norman
- 1980 Final Report on the Mapco River Bend Cultural Mitigation Study, AERC Paper No. 18 of the Archeological-Environmental Research Corporation, Bountiful.
- Hauck, F.R. and Dennis Weder
- 1989 Pariette Overlook -- A Paleo-Indian Quarry Site in the Pariette Draw Locality of Uintah County, Utah. AERC Paper No. 42 of the Archeological-Environmental Research Corporation, Bountiful.
- Sheetz, Rod
- 1998 Locality-Specific Paleontological Assessment. Report prepared for Inland Production Company, Museum of Western Colorado, Grand Junction.
- Stokes, W.L.
- 1977 Physiographic Subdivisions of Utah. Map 43, Utah Geological and Mineral Survey, Salt Lake City.
- Stokes, W.L. and James H. Madsen
- 1961 Geologic Map of Utah. College of Mines and Mineral Industries, University of Utah, Salt Lake City.



U.S.  
Department of the Interior  
Bureau of Land Management  
Utah State Office  
(AERC FORMAT)

Summary Report of  
Inspection for Cultural Resources

Project  
Authorization No UT-98-AF-0164bs

Report Acceptable Yes ☐ No ☐

Mitigation Acceptable Yes ☐ No ☐  
Comments: \_\_\_\_\_

Cultural Resource Evaluation of Various Large Tracts in the  
Wells Draw to Pariette Bench Locality of Duchesne & Uintah  
Counties, Utah

1. Report Title . . . . .

Inland Resources, Inc.

2. Development Company \_\_\_\_\_

7 25 1998

UT-98-54937

3. Report Date . . . . . 4. Antiquities Permit No. \_\_\_\_\_

A E R C

IPC - 98 - 4

Uintah &

5. Responsible Institution . . . . . County Duchesne

6. Fieldwork

Location: TWN 0 9 S . RNG 15 E Sections 12  
TWN 0 9 S . RNG 16 E Sections 2, 3, 4, 7, 9, 10  
TWN 0 8 S . RNG 17 E Sections 35, 36  
TWN 0 9 S . RNG 17 E Sections 2, 15, 18, 22

7. Resource Area Diamond Mountain

8. Description of Examination Procedures: The archeologists directed by R. Hauck, or Glade Hadden, conducted intensive cultural resource evaluations of 7 project tracts situated in the Wells Draw to Pariette Bench locality. The survey was conducted by walking 15 to 20 meter-wide transects in the parcels.

9. Linear Miles Surveyed . . . . .

and/or 3,919

Definable Acres Surveyed . . . . .

and/or

Legally Undefinable

Acres Surveyed . . . . .

10. Inventory Type . . . . .

R = Reconnaissance

I = Intensive

S = Statistical Sample

11. Description of Findings:

A total of 28 archaeological sites was recorded during this inventory. These sites include 42DC1149, 42DC1150, 42DC 1155-1166, 1171, 1174-1177, and 42Un 2532-2538, 2552 and 2566. Sites 42DC 1149, 1150, 1158, 1159, 1161, 1162, 1174, 1175 and 42UN 2535, 2537, 2538 and 2552 are considered significant resources.

12. Number Sites Found 28 . . . . .

(No sites = 0)

13. Collection: .Y.

(Y = Yes, N = No)

14. Actual/Potential National Register Properties Affected:

The National Register of Historic Places (NRHP) has been consulted and no registered properties will be affected by the proposed development.

15. Literature Search, Location/ Date: Utah SHPO 11-6-97 Vernal BLM 3-18-98



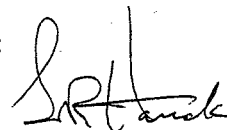
16. Conclusion/ Recommendations:

AERC recommends that a cultural resource clearance be granted to Inland Resources, Inc. for the proposed developments based on the following stipulations:

1. All significant sites (42DC 1149, 1150, 1158, 1159, 1161, 1162, 1174, 1175 and 42UN 2535, 2537, 2538 and 2552) should be avoided during any surface disturbance or development in their vicinities.
2. All vehicular traffic, personnel movement, construction and restoration operations should be confined to the surveyed zones and to the existing roadways;
3. All personnel should refrain from collecting artifacts and from disturbing any cultural resources in the area; and
4. The authorized official should be consulted should cultural remains from subsurface deposits be exposed during construction work or if the need arises to relocate or otherwise alter the location of the exploration area.

17. Signature of Administrator & Field Supervisor

Administrator:



Field  
Supervisor:

UT 8100-3 (2/85)



**WORKSHEET**  
**APPLICATION FOR PERMIT TO DRILL**

APD RECEIVED: 10/23/2001

API NO. ASSIGNED: 43-013-32314

WELL NAME: MON BUTTE 2-2-9-16

OPERATOR: INLAND PRODUCTION ( N5160 )

CONTACT: MANDIE CROZIER

PHONE NUMBER: 435-646-3721

**PROPOSED LOCATION:**

NWNE 02 090S 160E

SURFACE: 0660 FNL 1980 FEL

BOTTOM: 0660 FNL 1980 FEL

DUCHESNE

MONUMENT BUTTE ( 105 )

INSPECT LOCATN BY: / /

Tech Review	Initials	Date
Engineering	DKD	11/30/01
Geology		
Surface		

LEASE TYPE: 3 - State

LEASE NUMBER: ML-21839 *fc*

SURFACE OWNER: 3 - State

PROPOSED FORMATION: GRRV

**RECEIVED AND/OR REVIEWED:**

☒ Plat

☒ Bond: Fed[] Ind[] Sta[3] Fee[]  
(No. 4471291 )

N Potash (Y/N)

N Oil Shale 190-5 (B) or 190-3 or 190-13

☒ Water Permit

(No. MUNICIPAL )

N RDCC Review (Y/N)

(Date: )

N/A Fee Surf Agreement (Y/N)

**LOCATION AND SITING:**

       R649-2-3. Unit MONUMENT BUTTE GR "D"

☒ R649-3-2. General

Siting: 460 From Qtr/Qtr & 920' Between Wells

       R649-3-3. Exception

☒ Drilling Unit

Board Cause No: 213-1

Eff Date: 8-14-87

Siting: x Gen. Siting

       R649-3-11. Directional Drill

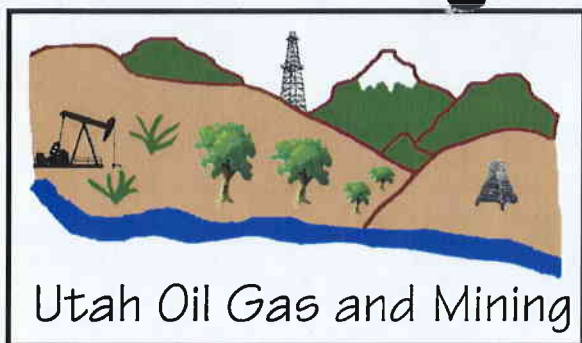
**COMMENTS:**

Need presite. (11-6-01)

**STIPULATIONS:**

1- Statement of Basis



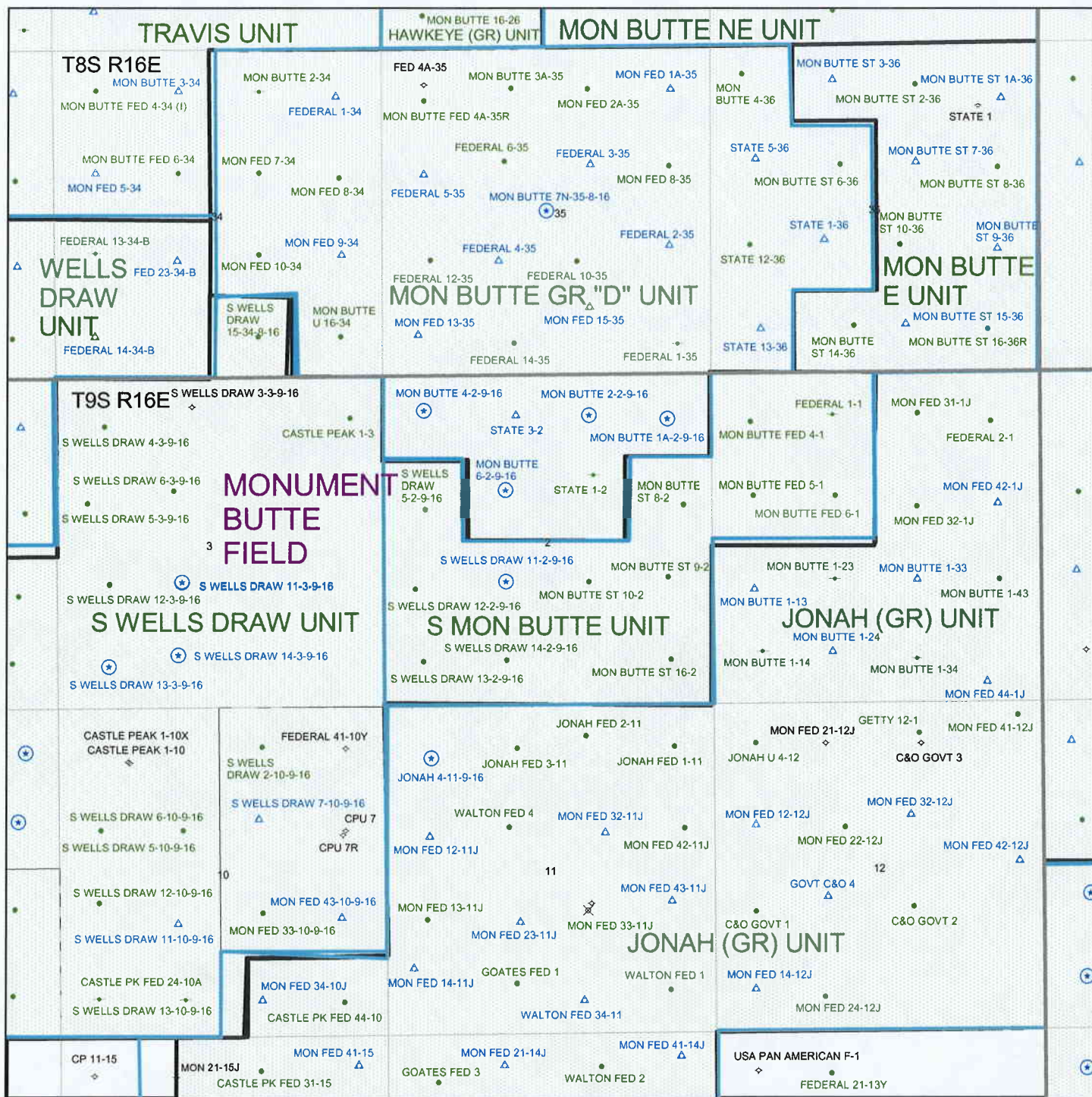


OPERATOR: INLAND PROD CO (N5160)

SEC. 2, T9S, R16E

FIELD: MONUMENT BUTTE (105)

COUNTY: DUCHESNE UNIT: MON BUTTE GR D  
CAUSE: 213-1





**DIVISION OF OIL, GAS AND MINING  
APPLICATION FOR PERMIT TO DRILL  
STATEMENT OF BASIS**

**Operator Name:** Inland Production Company  
**Well Name & Number:** Monument Butte 2-2-9-16  
**API Number:** 43-013-32314  
**Location:** 1/4, 1/4 NW/NE Sec. 2 T. 09S R. 16E

**Geology/Ground Water:**

Inland has proposed setting 290' of surface casing at this location. The depth to the base of the moderately saline ground water is estimated to be at around 600'. A search of Division of Water Rights records indicates that no water wells are located within a 10,000 foot radius of the center of Section 2. The surface formation at this location is the Uinta Formation. The Uinta Formation is made up of interbedded sandstones and shales. The Sandstones are of a discontinuous nature and probably don't represent a significant aquifer. The existing casing should adequately protect any useable ground water.

**Reviewer:** Brad Hill  
**Date:** 11/19/2001

**Surface:**

An onsite of the surface area was done by the division to take comments and address issues related to the proposed disturbance of surface. SITLA was shown as the surface owner and therefore invited to the onsite meeting on 10/31/01, along with Division of Wildlife Resources. Inland will need to build a diversion dam as drainage crosses the location from west to east at corners #7 to corner #3 and #4. They will need to re-route said drainage around north of location and berm location to assure any potential run-off stays in new water course. The access road also comes in from east and crosses this new drainage ditch and will require a low water crossing or culvert sufficient to handle anticipated water flow. The reserve pit was proposed in an area that is loaded with blow sand at the surface and indicates a pit liner is probably necessary to fluid.

*contain*

**Reviewer:** Dennis L. Ingram  
**Date:** 11/13/01

**Conditions of Approval/Application for Permit to Drill:**

1. Divert existing drainages around location.
2. A synthetic liner with a minimum thickness of 12 mils shall be properly installed and maintained in the reserve pit.



**ON-SITE PREDRILL EVALUATION**  
**Division of Oil, Gas and Mining**

**OPERATOR:** Inland Production Company  
**WELL NAME & NUMBER:** Monument Butte 2-2-9-16  
**API NUMBER:** 43-013-32314  
**LEASE:** U-16535 **FIELD/UNIT:** Monument Butte  
**LOCATION:** 1/4, 1/4 NW/NE Sec: 2 TWP: 09S RNG: 16E  
1980' F E L 660' F N L  
**LEGAL WELL SITING:** Statewide 400 foot window in center of 40  
acre tract and no closer than 920 feet from  
another well.  
**GPS COORD (UTM):** 12 578122E; 4435378N  
**SURFACE OWNER:** SITLA (State Lands)

**PARTICIPANTS:**

Brad Mecham (Inland Production Company) Dennis L. Ingram (DOGM)

**REGIONAL/LOCAL SETTING & TOPOGRAPHY:**

Well proposed approximately 9.0 miles south of Myton, Utah on  
southern slope of broad east/west bench and in upper end of dry  
wash in bottom of drainage.

**SURFACE USE PLAN:**

CURRENT SURFACE USE: Livestock grazing, recreational  
hunting, and wildlife use.

PROPOSED SURFACE DISTURBANCE: Proposed access from 1A-2-9-16  
east on northern slope of dry wash as +990 feet and location  
measuring 162'x 305' plus reserve pit use along with surface  
use for storing surface top soil and other waste stock.

LOCATION OF EXISTING WELLS WITHIN A 1 MILE RADIUS: See GIS  
data base

LOCATION OF PRODUCTION FACILITIES AND PIPELINES: All  
production equipment were proposed as onsite with residue  
and sales lines hooked to in field existing lines from  
access roads.

SOURCE OF CONSTRUCTION MATERIAL: Native cut and fill or  
borrowed material



ANCILLARY FACILITIES: None requested by operator at onsite meeting.

**WASTE MANAGEMENT PLAN:**

Attached to APD and submitted to the division under the thirteen point use plan item #7

**ENVIRONMENTAL PARAMETERS:**

AFFECTED FLOODPLAINS AND/OR WETLANDS: Located on upper reach of dry drainage

FLORA/FAUNA: Shadscale community typical of desert region with relatively good ground cover that includes rabbit brush, native grasses, prickly-pear cactus. Primary antelope range with mule deer and mountain plover potential, having coyotes, rabbits, bobcat, mountain lion, owl, raptures and smaller birds and insect life.

SOIL TYPE AND CHARACTERISTICS: Fine-grained light tan sandy soil loam typical of dry wash bed in region.

EROSION/SEDIMENTATION/STABILITY: Active but minor erosion, some sedimentation, no stability problems anticipated with project.

PALEONTOLOGICAL POTENTIAL: None observed during onsite meeting

**RESERVE PIT:**

CHARACTERISTICS: Proposed on south side of location in cut and adjacent to but not upwind of wellhead and prevailing winds, measuring 40'x 80'x 10' deep.

LINER REQUIREMENTS (Site Ranking Form attached): 25 points

**SURFACE RESTORATION/RECLAMATION PLAN:**

According to landowner agreement or as required by SITLA

**SURFACE AGREEMENT:** Yes

**CULTURAL RESOURCES/ARCHAEOLOGY:** Was done and submitted to the division with APD



**OTHER OBSERVATIONS/COMMENTS:**

Power line east of location that access road crosses from 1A-2-9-16. Well bore staking just south of dry drainage bottom, and shall require re-routing to the north. Loose blow sand evident where reserve pit is staked.

**ATTACHMENTS:**

Photos of surface in predrill or construction status

Dennis L. Ingram  
**DOGM REPRESENTATIVE**

11/06/01 3:15 PM  
**DATE/TIME**



**Evaluation Ranking Criteria and Ranking Score  
For Reserve and On-site Pit Liner Requirements**

<u>Site-Specific Factors</u>	<u>Ranking</u>	<u>Site Ranking</u>
<b>Distance to Groundwater (feet)</b>		
>200	0	
100 to 200	5	
75 to 100	10	
25 to 75	15	
<25 or recharge area	20	<u>0</u>
<b>Distance to Surf. Water (feet)</b>		
>1000	0	
300 to 1000	2	
200 to 300	10	
100 to 200	15	
< 100	20	<u>0</u>
<b>Distance to Nearest Municipal Well (feet)</b>		
>5280	0	
1320 to 5280	5	
500 to 1320	10	
<500	15	<u>0</u>
<b>Distance to Other Wells (feet)</b>		
>1320	0	
300 to 1320	10	
<300	20	<u>0</u>
<b>Native Soil Type</b>		
Low permeability	0	
Mod. permeability	10	
High permeability	20	<u>20</u>
<b>Fluid Type</b>		
Air/mist	0	
Fresh Water	5	
TDS >5000 and <10000	15	
TDS >10000 or Oil Base	20	
Mud Fluid containing high levels of hazardous constituents		<u>5</u>
<b>Drill Cuttings</b>		
Normal Rock	0	
Salt or detrimental	10	<u>0</u>
<b>Annual Precipitation (inches)</b>		
<10	0	
10 to 20	5	
>20	10	<u>0</u>
<b>Affected Populations</b>		
<10	0	
10 to 30	6	
30 to 50	8	
>50	10	<u>0</u>
<b>Presence of Nearby Utility</b>		
<b>Conduits</b>		
Not Present	0	
Unknown	10	
Present	15	<u>0</u>
<b>Final Score</b>		<u>25 points</u>



Casing Schematic

Surface

8-5/8"  
MW 8.4  
Frac 19.3

TOC @ 1.  
TOC @ 0.  
Surface  
290. MD

w/128 washout

BOP

BHP

$$(0.052)(8.4)(6500) = 2839 \text{ psi}$$

Anticipated = 2000 psi

Gas

$$(0.12)(6500) = 780 \text{ psi}$$

MAASP = 2059 psi

Gas/mud

$$(0.22)(6500) = 1430 \text{ psi}$$

MAASP = 1409 psi

2 m BOPF proposed

Adequate p

DRD 11/30/01

1700'  
Green River

wasnt  
5-1/2"  
MW 8.4

Production  
6500. MD

w/118 washout



Well name:	<b>11-01 Inland Monument Butte 2-2-9-16</b>	
Operator:	<b>Inland Production Company</b>	Project ID:
String type:	<b>Surface</b>	<b>43-013-32314</b>
Location:	<b>Duchesne Co.</b>	

**Design parameters:**
**Collapse**

Mud weight: 8.400 ppg  
Design is based on evacuated pipe.

**Minimum design factors:**
**Collapse:**

Design factor 1.125

**Burst:**

Design factor 1.00

**Environment:**

H2S considered? No  
Surface temperature: 65 °F  
Bottom hole temperature: 69 °F  
Temperature gradient: 1.40 °F/100ft  
Minimum section length: 290 ft

Cement top: Surface

**Burst**

Max anticipated surface pressure: 0 psi  
Internal gradient: 0.436 psi/ft  
Calculated BHP 127 psi

No backup mud specified.

**Tension:**

8 Round STC: 1.80 (J)  
8 Round LTC: 1.80 (J)  
Buttress: 1.60 (J)  
Premium: 1.50 (J)  
Body yield: 1.50 (B)

Tension is based on buoyed weight.  
Neutral point: 253 ft

Non-directional string.

**Re subsequent strings:**

Next setting depth: 6,500 ft  
Next mud weight: 8.400 ppg  
Next setting BHP: 2,836 psi  
Fracture mud wt: 19.250 ppg  
Fracture depth: 290 ft  
Injection pressure 290 psi

Run Seq	Segment Length (ft)	Size (in)	Nominal Weight (lbs/ft)	Grade	End Finish	True Vert Depth (ft)	Measured Depth (ft)	Drift Diameter (in)	Internal Capacity (ft³)
1	290	8.625	24.00	J-55	ST&C	290	290	7.972	14

Run Seq	Collapse Load (psi)	Collapse Strength (psi)	Collapse Design Factor	Burst Load (psi)	Burst Strength (psi)	Burst Design Factor	Tension Load (Kips)	Tension Strength (Kips)	Tension Design Factor
1	127	1370	<u>10.83</u>	127	2950	<u>23.31</u>	6	244	<u>40.12 J</u>

Prepared by: Dustin K. Doucet  
Utah Dept. of Natural Resources

Phone: 801-538-5281  
FAX: 801-359-3940

Date: November 29, 2001  
Salt Lake City, Utah

**ENGINEERING STIPULATIONS: NONE**

Collapse strength is based on the Westcott, Dunlop & Kemler method of biaxial correction for tension.

Collapse is based on a vertical depth of 290 ft, a mud weight of 8.4 ppg. The casing is considered to be evacuated for collapse purposes.

Burst strength is not adjusted for tension.

*Engineering responsibility for use of this design will be that of the purchaser.*



Well name:	<b>11-01 Inland Monument Butte 2-2-9-16</b>	
Operator:	<b>Inland Production Company</b>	
String type:	Production	Project ID: 43-013-32314
Location:	Duchesne Co.	

**Design parameters:**
**Collapse**

Mud weight: 8.400 ppg  
Design is based on evacuated pipe.

**Minimum design factors:**
**Collapse:**

Design factor 1.125

**Burst:**

Design factor 1.00

**Environment:**

H2S considered? No  
Surface temperature: 65 °F  
Bottom hole temperature: 156 °F  
Temperature gradient: 1.40 °F/100ft  
Minimum section length: 300 ft

Cement top:

1 ft

**Burst**

Max anticipated surface pressure: 0 psi  
Internal gradient: 0.436 psi/ft  
Calculated BHP: 2,836 psi

No backup mud specified.

**Tension:**

8 Round STC: 1.80 (J)  
8 Round LTC: 1.80 (J)  
Buttress: 1.60 (J)  
Premium: 1.50 (J)  
Body yield: 1.50 (B)

Non-directional string.

Tension is based on air weight.  
Neutral point: 5,674 ft

Run Seq	Segment Length (ft)	Size (in)	Nominal Weight (lbs/ft)	Grade	End Finish	True Vert Depth (ft)	Measured Depth (ft)	Drift Diameter (in)	Internal Capacity (ft³)
1	6500	5.5	15.50	J-55	LT&C	6500	6500	4.825	203.8

Run Seq	Collapse Load (psi)	Collapse Strength (psi)	Collapse Design Factor	Burst Load (psi)	Burst Strength (psi)	Burst Design Factor	Tension Load (Kips)	Tension Strength (Kips)	Tension Design Factor
1	2836	4040	1.42	2836	4810	1.70	101	217	2.15 J

Prepared by: Dustin K. Doucet  
Utah Dept. of Natural Resources

Phone: 801-538-5281  
FAX: 801-359-3940

Date: November 29, 2001  
Salt Lake City, Utah

**ENGINEERING STIPULATIONS: NONE**

Collapse strength is based on the Westcott, Dunlop & Kemler method of biaxial correction for tension.

Collapse is based on a vertical depth of 6500 ft, a mud weight of 8.4 ppg. The casing is considered to be evacuated for collapse purposes.

Burst strength is not adjusted for tension.

*Engineering responsibility for use of this design will be that of the purchaser.*









State of Utah  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

Michael O. Leavitt  
Governor

Kathleen Clarke  
Executive Director

Lowell P. Braxton  
Division Director

1594 West North Temple, Suite 1210

PO Box 145801

Salt Lake City, Utah 84114-5801

801-538-5340

801-359-3940 (Fax)

801-538-7223 (TDD)

December 3, 2001

Inland Production Company  
Route 3 Box 3630  
Myton, UT 84052

Re: Monument Butte 2-2-9-16 Well, 660' FNL, 1980' FEL, NW NE, Sec. 2, T. 9 South,  
R. 16 East, Duchesne County, Utah

Gentlemen:

Pursuant to the provisions and requirements of Utah Code Ann. § 40-6-1 *et seq.*, Utah Administrative Code R649-3-1 *et seq.*, and the attached Conditions of Approval, approval to drill the referenced well is granted.

This approval shall expire one year from the above date unless substantial and continuous operation is underway, or a request for extension is made prior to the expiration date. The API identification number assigned to this well is 43-013-32314.

Sincerely,

for

John R. Baza  
Associate Director

er

Enclosures

cc: Duchesne County Assessor  
SITLA



Operator: Inland Production Company  
Well Name & Number Monument Butte 2-2-9-16  
API Number: 43-013-32314  
Lease: ML 21839

Location: NW NE Sec. 2 T. 9 South R. 16 East

### Conditions of Approval

1. **General**

Compliance with the requirements of Utah Admin. R. 649-1 *et seq.*, the Oil and Gas Conservation General Rules, and the applicable terms and provisions of the approved Application for permit to drill.

2. **Notification Requirements**

The operator is required to notify the Division of Oil, Gas and Mining of the following actions during drilling of this well:

- 24 hours prior to cementing or testing casing
- 24 hours prior to testing blowout prevention equipment
- 24 hours prior to spudding the well
- within 24 hours of any emergency changes made to the approved drilling program
- prior to commencing operations to plug and abandon the well

The following are Division of Oil, Gas and Mining contacts and their work telephone numbers (please leave a voice mail message if the person is not available to take the call):

- Dan Jarvis at (801) 538-5338
- Carol Daniels at (801) 538-5284 (spud)

3. **Reporting Requirements**

All required reports, forms and submittals will be promptly filed with the Division, including but not limited to the Entity Action Form (Form 6), Report of Water Encountered During Drilling (Form 7), Weekly Progress Reports for drilling and completion operations, and Sundry Notices and Reports on Wells requesting approval of change of plans or other operational actions.

4. Compliance with the State of Utah Antiquities Act forbids disturbance of archeological, historical, or paleontological remains. Should archeological, historical or paleontological remains be encountered during your operations, you are required to immediately suspend all operations and immediately inform the Trust Lands Administration and the Division of State History of the discovery of such remains.

5. Compliance with the Conditions of Approval/Application for Permit to Drill outlined in the Statement of Basis. (Copy Attached)



## DIVISION OF OIL, GAS AND MINING

### **SPUDDING INFORMATION**

Name of Company: INLAND PRODUCTION COMPANY

Well Name: MON BUTTE 2-2-9-16

Api No: 43-013-32314 Lease Type: STATE

Section 02 Township 09S Range 16E County DUCHESNE

Drilling Contractor STUBBS Rig # 111

### **SPUDDED:**

Date 08/28/02

Time 9:30 AM

How DRY

**Drilling will commence:** \_\_\_\_\_

Reported by RAY HERRERA

Telephone # 1-435-823-1958

Date 08/29/2002 Signed: CHD



STATE OF UTAH  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS, AND MINING

<b>1. SUNDRY NOTICES AND REPORTS ON WELLS</b>  (Do not use this form for proposals to drill or to deepen or plug back to a different reservoir. Use "APPLICATION FOR PERMIT--" for such proposals.)		<b>5. LEASE DESIGNATION AND SERIAL NO.</b> <b>ML - 21839</b>	
<b>2. NAME OF OPERATOR</b> <b>INLAND PRODUCTION COMPANY</b>		<b>6. IF INDIAN, ALLOTTEE OR TRIBAL NAME</b>  N/A	
<b>3. ADDRESS OF OPERATOR</b> <b>Route 3, Box 3630 Myton, Utah 84052</b> <b>(435) 646-3721</b>		<b>7. UNIT AGREEMENT NAME</b>  	
<b>4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements.*</b> See also space 17 below.) At surface <b>1980' FEL &amp; 660' FNL NW/NE</b>		<b>8. FARM OR LEASE NAME</b> <b>Monument Butte Gr "D"</b>	
<b>14 API NUMBER</b> <b>43-013-32314</b>		<b>9.</b> <b>M. B. 2-2-9-16 #</b>	
<b>15. ELEVATIONS (Show whether DF, RT, GR, etc.)</b> <b>5475' GR</b>		<b>10 FIELD AND POOL OR WILDCAT</b> <b>Monument Butte</b>	
		<b>11 SEC., T., R., M., OR BLK. AND SURVEY OR AREA</b> <b>Sec 2, T9s, R16E</b>	
		<b>12 COUNTY OR PARISH</b> <b>Duchesne</b>	<b>13 STATE</b> <b>UT</b>

<b>16. Check Appropriate Box To Indicate Nature of Notice, Report, or Other Data</b>			
<b>NOTICE OF INTENTION TO:</b>		<b>SUBSEQUENT REPORT OF:</b>	
TEST WATER SHUT-OFF <input type="checkbox"/>	PULL OR ALTER CASING <input type="checkbox"/>	WATER SHUT-OFF <input type="checkbox"/>	REPAIRING WELL <input type="checkbox"/>
FRACTURE TREAT <input type="checkbox"/>	MULTIPLE COMPLETE <input type="checkbox"/>	FRACTURE TREATMENT <input type="checkbox"/>	ALTERING CASING <input type="checkbox"/>
SHOOT OR ACIDIZE <input type="checkbox"/>	ABANDON* <input type="checkbox"/>	SHOOTING OR ACIDIZING <input type="checkbox"/>	ABANDONMENT* <input type="checkbox"/>
REPAIR WELL <input type="checkbox"/>		(OTHER) <u>Spud</u>	<input checked="" type="checkbox"/>
(OTHER) _____	<input type="checkbox"/>	(Note: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)	

**17 DESCRIBE PROPOSED OR COMPLETED OPERATIONS.** (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work. If well is directionally drilled, give subsurface locations and measured and true vertical depths for all markers and zones pertinent to this work.)\*  
MIRU Stubb's rig # 111. Spud well @ 9:30am on 8/28/02. Drill 12 1/4" hole to a depth of 290'. PU & MU 7 jt's 85/8" J-55 24# csqn set depth of 298.39'/KB. On 8/30/02 Cement with 145 sks of Class "G" w/ 2% CaCL2 + 1/4# sk Cello-Flake Mixed @ 15.8 ppg > 1.17 cf/sk yeild. 8 bbls cement returned to surface.

I hereby certify that the foregoing is true and correct  
SIGNED Pat Wisen TITLE Drilling Foreman DATE 09/01/2002

(This space for Federal or State office use)

APPROVED BY \_\_\_\_\_ TITLE \_\_\_\_\_ DATE \_\_\_\_\_  
CONDITIONS OF APPROVAL, IF ANY:

\* See Instructions On Reverse Side

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**SEP 04 2002**

**DIVISION OF  
OIL, GAS AND MINING**



# INLAND PRODUCTION COMPANY - CASING & CEMENT REPORT

8 5/8 CASING SET AT 298.39

LAST CASING 8 5/8" SET AT 298.39'  
 DATUM 10' KB  
 DATUM TO CUT OFF CASING \_\_\_\_\_  
 DATUM TO BRADENHEAD FLANGE \_\_\_\_\_  
 TD DRILLER 290' LOGGER \_\_\_\_\_  
 HOLE SIZE 12 1/4

OPERATOR Inland Production Company  
 WELL Monument Butte 2-2-9-16  
 FIELD/PROSPECT Monument Butte  
 CONTRACTOR & RIG # Stubbs # 111

LOG OF CASING STRING:							
PIECES	OD	ITEM - MAKE - DESCRIPTION	WT / FT	GRD	THREAD	CONDT	LENGTH
		37.75' SH JT					
		WHI - 92 csg head			8rd	A	0.95
7	8 5/8"	Maverick ST&C csg	24#	J-55	8rd	A	288.54
		<b>GUIDE</b> shoe			8rd	A	0.9
CASING INVENTORY BAL.		FEET	JTS	TOTAL LENGTH OF STRING			290.39
TOTAL LENGTH OF STRING		290.39	7	LESS CUT OFF PIECE			2
LESS NON CSG. ITEMS		1.85		PLUS DATUM TO T/CUT OFF CSG			10
PLUS FULL JTS. LEFT OUT		0		CASING SET DEPTH			<b>298.39</b>
TOTAL		288.54	7	} COMPARE			
TOTAL CSG. DEL. (W/O THRDS)		288.54'	7				
TIMING		1ST STAGE					
BEGIN RUN CSG.		SPUD	08/28/2002	GOOD CIRC THRU JOB <u>Yes</u>			
CSG. IN HOLE			9:30am	Bbls CMT CIRC TO SURFACE <u>8</u>			
BEGIN CIRC				RECIPROCATED PIPE FOR _____ THRU _____ FT STROKE			
BEGIN PUMP CMT				DID BACK PRES. VALVE HOLD ? <u>N/A</u>			
BEGIN DSPL. CMT				BUMPED PLUG TO <u>195</u> PSI			
PLUG DOWN		<b>Cemented</b>	08/30/2002				
CEMENT USED		CEMENT COMPANY- <b>B. J.</b>					
STAGE	# SX	CEMENT TYPE & ADDITIVES					
1	145	Class "G" w/ 2% CaCL2 + 1/4#/sk Cello-Flake mixed @ 15.8 ppg 1.17 cf/sk yield					
CENTRALIZER & SCRATCHER PLACEMENT		SHOW MAKE & SPACING					
Centralizers - Middle first, top second & third for 3							

## RECEIVED

SEP 04 2002

COMPANY REPRESENTATIVE Pat Wisener **DIVISION OF** DATE 08/30/2002  
**OIL, GAS AND MINING**



P. 02  
FAX NO. 435 846 3031  
INLAND PRODUCTION CO  
SEP-05-02 THU 09:03 AM

STATE OF UTAH  
DIVISION OF OIL, GAS AND MINING  
ENTITY ACTION FORM - FORM 6

OPERATOR: INLAND PRODUCTION COMPANY  
ADDRESS: RT. 3 BOX 3630  
MYTON, UT 84052

OPERATOR ACCT. NO. N5160

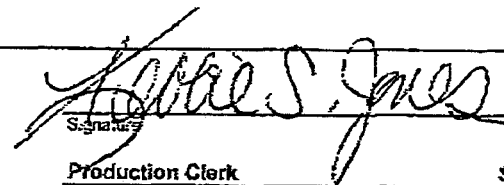
ACTION CODE	CURRENT ENTITY NO	NEW ENTITY NO	API NUMBER	WELL NAME	WELL LOCATION					SPUD DATE	EFFECTIVE DATE
					Q2	SC	TP	RG	COUNTY		
A	99999	12276	43-013-32330	Wells Draw #14A-34-8-16	SE/SW	34	8S	16E	Duchesne	August 16, 2002	9-5-02 08/16/02
WELL 1 COMMENTS											
A	99999	10835	43-013-32313	MBS #1A-2-9-16	NE/NE	2	9S	16E	Duchesne	August 19, 2002	9-5-02 08/19/02
WELL 2 COMMENTS											
A	99999	10835	43-013-32314	MB #2-2-9-16	NW/NE	2	9S	16E	Duchesne	August 28, 2002	9-5-02 08/28/02
WELL 3 COMMENTS											
A	99999	10835	43-013-32315	MB #4-2-9-16	NW/NW	2	9S	16E	Duchesne	August 29, 2002	9-5-02 08/29/02
WELL 4 COMMENTS											
A											
WELL 5 COMMENTS											

ACTION CODES (See instructions on back of form)

- A - Establish new entity for new well (single well only)
- S - Add new well to existing entity (group or unit well)
- C - Re-assign well from one existing entity to another existing entity
- D - Re-assign well from one existing entity to a new entity
- E - Other (explain in comments section)

NOTE: Use COMMENT section to explain why each Action Code was selected.

(389)

  
Signature: Kethia S. Jones  
Production Clerk  
September 5, 2002  
Date



STATE OF UTAH  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS, AND MINING

<b>1. SUNDRY NOTICES AND REPORTS ON WELLS</b>  (Do not use this form for proposals to drill or to deepen or plug back to a different reservoir. Use "APPLICATION FOR PERMIT--" for such proposals.)		<b>5. LEASE DESIGNATION AND SERIAL NO.</b> <b>ML - 21839</b>	
<b>2. NAME OF OPERATOR</b> <b>INLAND PRODUCTION COMPANY</b>		<b>6. IF INDIAN, ALLOTTEE OR TRIBAL NAME</b>  <b>N/A</b>	
<b>3. ADDRESS OF OPERATOR</b> <b>Route 3, Box 3630 Myton, Utah 84052</b> <b>(435) 646-3721</b>		<b>7. UNIT AGREEMENT NAME</b>  <b>8. FARM OR LEASE NAME</b> <b>Monument Butte Gr "D"</b>	
<b>4. LOCATION OF WELL</b> (Report location clearly and in accordance with any State requirements.* See also space 17 below.) At surface <b>1980' FEL &amp; 660' FNL NW/NE</b>		<b>9.</b> <b>M. B. 2-2-9-16 #</b>	
<b>14 API NUMBER</b> <b>43-013-32314</b>		<b>15. ELEVATIONS</b> (Show whether DF, RT, GR, etc.) <b>5475' GR</b>	
<b>10 FIELD AND POOL, OR WILDCAT</b>  <b>Monument Butte</b>		<b>11 SEC., T., R., M., OR BLK. AND SURVEY OR AREA</b> <b>Sec 2, T9s, R16E</b>	
<b>12 COUNTY OR PARISH</b> <b>Duchesne</b>		<b>13 STATE</b> <b>UT</b>	

16. Check Appropriate Box To Indicate Nature of Notice, Report, or Other Data			
NOTICE OF INTENTION TO:		SUBSEQUENT REPORT OF:	
TEST WATER SHUT-OFF <input type="checkbox"/>	PULL OR ALTER CASING <input type="checkbox"/>	WATER SHUT-OFF <input type="checkbox"/>	REPAIRING WELL <input type="checkbox"/>
FRACTURE TREAT <input type="checkbox"/>	MULTIPLE COMPLETE <input type="checkbox"/>	FRACTURE TREATMENT <input type="checkbox"/>	ALTERING CASING <input type="checkbox"/>
SHOOT OR ACIDIZE <input type="checkbox"/>	ABANDON* <input type="checkbox"/>	SHOOTING OR ACIDIZING <input type="checkbox"/>	ABANDONMENT* <input type="checkbox"/>
REPAIR WELL <input type="checkbox"/>	<input type="checkbox"/>	(OTHER) <u>Weekly Status Report</u>	<input checked="" type="checkbox"/>
(OTHER) _____	<input type="checkbox"/>	(Note: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)	

RECEIVED  
DEC 31 2002

DIV. OF OIL, GAS & MINING

17 DESCRIBE PROPOSED OR COMPLETED OPERATIONS. (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work. If well is directionally drilled, give subsurface locations and measured and true vertical depths for all markers and zones pertinent to this work.)\*

On December 21, 2002. BOP testing was initiated. Bop's, Kelly, TIW, Choke manifold, to 2,000 psi. 85/8" surface csgn was tested to 1,500 psi. Roosevelt office of DOGM was notified .PU & MU 77/8" bit, MM, & BHA. TIH with same. Tag cement @ 260'. Drill out cement & shoe. Drill 77/8" hole with fresh water to a depth of 6115". Lay down drill string. Open hole log. PU & MU Guide shoe, 1 jt 51/2" csg. Float collar & 142 jt's J-55 15.5 # 51/2" csgn. Set @ 6107'/KB. Cement with 500 sks. 50/50 POZ w/3% KCL, 1/4#sk Cello-Flake, 2% Gel, 3%SMS, .05#sk Static free, Mixed @ 14.4PPG >1.24 YLD. Then 275 sks Premlite II w/10% GEL. & 3% KCL mixed to 11.ppg >3.43 YLD. \*25 bbls cement to surface. Bump plug to 1898 psi. Nipple down BOP's. Drop slips with 84,000#. Release rig @ 4:00 pm on 12-29-02.

18 I hereby certify that the foregoing is true and correct

SIGNED <u><i>Pat W. [Signature]</i></u>	TITLE <u>Drilling Foreman</u>	DATE <u>12/29/2002</u>	
---	-------------------------------	------------------------	--

(This space for Federal or State office use)

APPROVED BY \_\_\_\_\_ TITLE \_\_\_\_\_ DATE \_\_\_\_\_

CONDITIONS OF APPROVAL, IF ANY:



STATE OF UTAH  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS, AND MINING

<b>1. SUNDRY NOTICES AND REPORTS ON WELLS</b>  (Do not use this form for proposals to drill or to deepen or plug back to a different reservoir. Use "APPLICATION FOR PERMIT--" for such proposals.)		<b>5. LEASE DESIGNATION AND SERIAL NO.</b> <b>ML-21839</b>	
<b>2. NAME OF OPERATOR</b> <b>INLAND PRODUCTION COMPANY</b>		<b>6. IF INDIAN, ALLOTTEE OR TRIBAL NAME</b>  <b>N/A</b>	
<b>3. ADDRESS OF OPERATOR</b> <b>Rt. 3 Box 3630, Myton Utah 84052</b> <b>435-646-3721</b>		<b>7. UNIT AGREEMENT NAME</b>  <b>NA</b>	
<b>4. LOCATION OF WELL</b> (Report location clearly and in accordance with any State requirements.* See also space 17 below.) At surface <b>NW/NE Section 2, T9S R16E</b> <b>660 FNL 1980 FEL</b>		<b>8. FARM OR LEASE NAME</b> <b>MONUMENT BUTTE 2-2-9-16</b>	
<b>14. API NUMBER</b> <b>43-013-32314</b>		<b>9. WELL NO.</b> <b>MONUMENT BUTTE 2-2-9-16</b>	
<b>15. ELEVATIONS</b> (Show whether DF, RT, GR, etc.) <b>5475 GR</b>		<b>10. FIELD AND POOL, OR WILDCAT</b>  <b>MONUMENT BUTTE</b>	
<b>16. Check Appropriate Box To Indicate Nature of Notice, Report, or Other Data</b>		<b>11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA</b> <b>NW/NE Section 2, T9S R16E</b>	
<b>NOTICE OF INTENTION TO:</b>  TEST WATER SHUT-OFF <input type="checkbox"/> PULL OR ALTER CASING <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> MULTIPLE COMPLETE <input type="checkbox"/> SHOOT OR ACIDIZE <input type="checkbox"/> ABANDON* <input type="checkbox"/> REPAIR WELL <input type="checkbox"/> (OTHER) <input type="checkbox"/>		<b>SUBSEQUENT REPORT OF:</b>  WATER SHUT-OFF <input type="checkbox"/> REPAIRING WELL <input type="checkbox"/> FRACTURE TREATMENT <input type="checkbox"/> ALTERING CASING <input type="checkbox"/> SHOOTING OR ACIDIZING <input type="checkbox"/> ABANDONMENT* <input type="checkbox"/> (OTHER) <input checked="" type="checkbox"/> <b>Status report</b>	
<b>12. COUNTY OR PARISH</b> <b>DUCHESNE</b>		<b>13. STATE</b> <b>UT</b>	

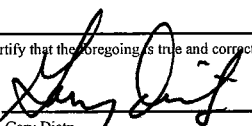
<b>16. Check Appropriate Box To Indicate Nature of Notice, Report, or Other Data</b>			
<b>NOTICE OF INTENTION TO:</b>  TEST WATER SHUT-OFF <input type="checkbox"/> PULL OR ALTER CASING <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> MULTIPLE COMPLETE <input type="checkbox"/> SHOOT OR ACIDIZE <input type="checkbox"/> ABANDON* <input type="checkbox"/> REPAIR WELL <input type="checkbox"/> (OTHER) <input type="checkbox"/>		<b>SUBSEQUENT REPORT OF:</b>  WATER SHUT-OFF <input type="checkbox"/> REPAIRING WELL <input type="checkbox"/> FRACTURE TREATMENT <input type="checkbox"/> ALTERING CASING <input type="checkbox"/> SHOOTING OR ACIDIZING <input type="checkbox"/> ABANDONMENT* <input type="checkbox"/> (OTHER) <input checked="" type="checkbox"/> <b>Status report</b>	

**17 DESCRIBE PROPOSED OR COMPLETED OPERATIONS.** (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work. If well is directionally drilled, give subsurface locations and measured and true vertical depths for all markers and zones pertinent to this work.)\*

Status report for time period 1/13/03 through 1/19/03.

Subject well had completion procedures initiated in the Green River formation without use of a service rig over the well. A CBL was ran and three intervals were perforated and hydraulically fracture treated using composite flow-through frac plugs between stages. Zones were swab and flow tested for sand cleanup. A service rig was moved on 1/17/03. Bridge plugs were drilled out and well was cleaned out to PBTD @ 6062'. Well is shut in for weekend at present time.

18 I hereby certify that the foregoing is true and correct

SIGNED <u></u>	TITLE <u>Completion Foreman</u>	DATE <u>1/19/2003</u>	
Gary Dietz			

cc: BLM

(This space for Federal or State office use)

APPROVED BY \_\_\_\_\_ TITLE \_\_\_\_\_ DATE \_\_\_\_\_

CONDITIONS OF APPROVAL, IF ANY:

\* See Instructions On Reverse Side

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JAN 22 2003

DIV. OF OIL, GAS & MINING



STATE OF UTAH  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS, AND MINING

<b>1. SUNDRY NOTICES AND REPORTS ON WELLS</b>  (Do not use this form for proposals to drill or to deepen or plug back to a different reservoir. Use "APPLICATION FOR PERMIT--" for such proposals.)		<b>5. LEASE DESIGNATION AND SERIAL NO.</b> <b>ML-21839</b>	
<b>2. NAME OF OPERATOR</b> <b>INLAND PRODUCTION COMPANY</b>		<b>6. IF INDIAN, ALLOTTEE OR TRIBAL NAME</b>  <b>N/A</b>	
<b>3. ADDRESS OF OPERATOR</b> <b>Rt. 3 Box 3630, Myton Utah 84052</b> <b>435-646-3721</b>		<b>7. UNIT AGREEMENT NAME</b>  <b>NA</b>	
<b>4. LOCATION OF WELL</b> (Report location clearly and in accordance with any State requirements.* See also space 17 below.) At surface <b>NW/NE Section 2, T9S R16E</b> <b>660 FNL 1980 FEL</b>		<b>8. FARM OR LEASE NAME</b> <b>MONUMENT BUTTE 2-2-9-16</b>	
<b>14. API NUMBER</b> <b>43-013-32314</b>		<b>9. WELL NO.</b> <b>MONUMENT BUTTE 2-2-9-16</b>	
<b>15. ELEVATIONS</b> (Show whether DF, RT, GR, etc.) <b>5475 GR</b>		<b>10. FIELD AND POOL, OR WILDCAT</b>  <b>MONUMENT BUTTE</b>	
<b>12. COUNTY OR PARISH</b> <b>DUCHESNE</b>		<b>11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA</b> <b>NW/NE Section 2, T9S R16E</b>	
<b>13. STATE</b> <b>UT</b>			

16. Check Appropriate Box To Indicate Nature of Notice, Report, or Other Data			
NOTICE OF INTENTION TO:		SUBSEQUENT REPORT OF:	
TEST WATER SHUT-OFF <input type="checkbox"/> PULL OR ALTER CASING <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> MULTIPLE COMPLETE <input type="checkbox"/> SHOOT OR ACIDIZE <input type="checkbox"/> ABANDON* <input type="checkbox"/> REPAIR WELL <input type="checkbox"/> (OTHER) <input type="checkbox"/>	WATER SHUT-OFF <input type="checkbox"/> REPAIRING WELL <input type="checkbox"/> FRACTURE TREATMENT <input type="checkbox"/> ALTERING CASING <input type="checkbox"/> SHOOTING OR ACIDIZING <input type="checkbox"/> ABANDONMENT* <input type="checkbox"/> (OTHER) <input checked="" type="checkbox"/> <b>Status report</b>		
(Note: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)			

17 DESCRIBE PROPOSED OR COMPLETED OPERATIONS. (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work. If well is directionally drilled, give subsurface locations and measured and true vertical depths for all markers and zones pertinent to this work.)\*

Status report for time period 1/20/03 through 1/26/03.

Subject well had completion procedures initiated in the Green River formation without use of a service rig over the well. A CBL was ran and three intervals were perforated and hydraulically fracture treated using composite flow-through frac plugs between stages. Zones were flow tested for sand cleanup. A service rig was moved on 1/17/03. Bridge plugs were drilled out and well was cleaned out to PBTD @ 6062'. Bit was pull and a production tbg string was ran in and anchored in well. Well was placed on production via rod pump on 1/21/03.

18 I hereby certify that the foregoing is true and correct

SIGNED *Gary Dietz* TITLE Completion Foreman DATE Jan. 26, 2003  
Gary Dietz

cc: BLM

(This space for Federal or State office use)

APPROVED BY \_\_\_\_\_ TITLE \_\_\_\_\_ DATE \_\_\_\_\_  
 CONDITIONS OF APPROVAL, IF ANY:

\* See Instructions On Reverse Side

RECEIVED

JAN 29 2003

DIV. OF OIL, GAS & MINING



## STATE OF UTAH

## DIVISION OF OIL, GAS, AND MINING

1. <b>SUNDRY NOTICES AND REPORTS ON WELLS</b>		5. LEASE DESIGNATION AND SERIAL NO. <b>ML-21839</b>
Do not use this form for proposals to drill new wells, deepen existing wells, or to reenter plugged and abandoned wells. Use "APPLICATION FOR PERMIT TO DRILL OR DEEPEN" form for such proposals.		6. IF INDIAN, ALLOTTEE OR TRIBAL NAME  <b>N/A</b>
OIL <input type="checkbox"/> GAS <input type="checkbox"/> WELL <input type="checkbox"/> WELL <input type="checkbox"/> OTHER <input checked="" type="checkbox"/>		7. UNIT AGREEMENT NAME  <b>MONUMENT BUTTE</b>
2. NAME OF OPERATOR <b>INLAND PRODUCTION COMPANY</b>		8. WELL NAME and NUMBER <b>MONUMENT BUTTE 2-2-9-16</b>
3. ADDRESS AND TELEPHONE NUMBER <b>Rt. 3 Box 3630, Myton Utah 84052</b> <b>435-646-3721</b>		9. API NUMBER <b>43-013-32314</b>
4. LOCATION OF WELL  Footages <b>660 FNL 1980 FEL</b>  QQ, SEC, T, R, M: <b>NW/NE Section 2, T9S R16E</b>		10. FIELD AND POOL, OR WILDCAT  <b>MONUMENT BUTTE</b>
		COUNTY <b>DUCHESNE</b> STATE <b>UTAH</b>

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT OR OTHER DATA	
NOTICE OF INTENT: (Submit in Duplicate) <input type="checkbox"/> ABANDON <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> REPAIR CASING <input type="checkbox"/> PULL OR ALTER CASING <input type="checkbox"/> CHANGE OF PLANS <input type="checkbox"/> RECOMPLETE <input type="checkbox"/> CONVERT TO INJECTION <input type="checkbox"/> REPERFORATE <input type="checkbox"/> FRACTURE TREAT OR ACIDIZE <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> MULTIPLE COMPLETION <input type="checkbox"/> WATER SHUT OFF <input checked="" type="checkbox"/> OTHER <u>Dispose Water</u>	SUBSEQUENT REPORT OF: (Submit Original Form Only) <input type="checkbox"/> ABANDON* <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> REPAIR CASING <input type="checkbox"/> PULL OR ALTER CASING <input type="checkbox"/> CHANGE OF PLANS <input type="checkbox"/> RECOMPLETE <input type="checkbox"/> CONVERT TO INJECTION <input type="checkbox"/> REPERFORATE <input type="checkbox"/> FRACTURE TREAT OR ACIDIZE <input type="checkbox"/> VENT OR FLARE <input type="checkbox"/> OTHER _____ DATE WORK COMPLETED _____ Report results of Multiple Completion and Recompletions to different reservoirs on WELL COMPLETION OR RECOMPLETION REPORT AND LOG form. *Must be accompanied by a cement verification report.

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. (Clearly state all pertinent details, and give pertinent dates. If well is directionally drilled, give subsurface locations and measured and true vertical depth for all markers and zones pertinent to this work.)

Formation water is produced to a steel storage tank. If the production water meets quality guidelines, it is transported to the Ashley, Monument Butte, Jonah, and Beluga water injection facilities by company or contract trucks. Subsequently, the produced water is injected into approved Class II wells to enhance Inland's secondary recovery project.

Water not meeting quality criteria, is disposed at Inland's Pariette #4 disposal well (Sec. 7, T9S R19E) or at State of Utah approved surface disposal facilities.

13. NAME & SIGNATURE: Mandie Crozier TITLE Regulatory Specialist DATE 11/13/2003  
 (This space for State use only)

Accepted by the  
Utah Division of  
Oil, Gas and Mining  
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DIV. OF OIL, GAS & MINING



UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

WELL COMPLETION OR RECOMPLETION REPORT AND LOG\*

1a. TYPE OF WORK

OIL WELL ☒ GAS WELL ☐ DRY ☐ Other \_\_\_\_\_

1b. TYPE OF WELL

NEW WELL ☒ WORK OVER ☐ DEEPEN ☐ PLUG BACK ☐ DIFF RESVR. ☐ Other \_\_\_\_\_

2. NAME OF OPERATOR

INLAND RESOURCES INC.

3. ADDRESS AND TELEPHONE NO.

410 17th St. Suite 700 Denver, CO 80202

4. LOCATION OF WELL (Report locations clearly and in accordance with any State requirements.)\*

At Surface 660' FNL & 1980' FEL (NWNE) Sec. 2, Twp 9S, Rng 16E

At top prod. Interval reported below

At total depth

14. API NO. 43-013-32314 DATE ISSUED 12/03/01

12. COUNTY OR PARISH Duchesne 13. STATE UT

15. DATE SPUDDED 8/28/02 16. DATE T.D. REACHED 12/28/02 17. DATE COMPL. (Ready to prod.) 1/21/03 18. ELEVATIONS (DF, RKB, RT, GR, ETC.)\* 5475' GL 5487' KB 19. ELEV. CASINGHEAD

20. TOTAL DEPTH, MD & TVD 6115' 21. PLUG BACK T.D., MD & TVD 6107' 22. IF MULTIPLE COMPL., HOW MANY\* 23. INTERVALS DRILLED BY -----> 24. PRODUCING INTERVAL(S), OF THIS COMPLETION--TOP, BOTTOM, NAME (MD AND TVD)\* Green River (4332'-5380')

26. TYPE ELECTRIC AND OTHER LOGS RUN

1-13-03 DIGL/SP/CDL/GR/Cal 1-23-03

23. CASING RECORD (Report all strings set in well)

CASING SIZE/GRADE	WEIGHT, LB./FT.	DEPTH SET (MD)	HOLE SIZE	TOP OF CEMENT, CEMENTING RECORD	AMOUNT PULLED
8-5/8" - J-55	24#	298.39'	12-1/4"	To surface with 145 sx Class "G" cmt	
5-1/2" - J-55	15.5#	6107.91'	7-7/8"	275 sx Premlite II and 500 sx 50/50 Poz	

29. LINER RECORD

SIZE	TOP (MD)	BOTTOM (MD)	SACKS CEMENT*	SCREEN (MD)	SIZE	DEPTH SET (MD)	PACKER SET (MD)
					2-7/8"	EOT @	TA @
						5433.84'	5274.75'

31. PERFORATION RECORD (Interval, size and number)

INTERVAL	SIZE	SPF/NUMBER	DEPTH INTERVAL (MD)	AMOUNT AND KIND OF MATERIAL USED
(A3) 5377-80', 5322-37'	.038"	4/42	5322'-5380'	Frac w/ 88,874# 20/40 sand in 650 bbls frac fluid.
(C/D1) 5020-28', 4859-64', 4867-70'	.038"	4/64	4859'-5028'	Frac w/ 68,788# 20/40 sand in 540 bbls frac fluid.
(GB4, GB6, PB10) 4559-66', 4570-74', 4369-72', 4393-97', 4332-38, 4349-51'	.038"	4/86	4332'-4574'	Frac w/ 65,544# 20/40 sand in 519 bbls frac fluid.

33.\* PRODUCTION

DATE FIRST PRODUCTION 1/21/03		PRODUCTION METHOD (Flowing, gas lift, pumping--size and type of pump) 2-1/2" x 1-1/2" x 15' RHAC Pump					WELL STATUS (Producing or shut-in) PRODUCING	
DATE OF TEST  10 day ave	HOURS TESTED	CHOKE SIZE	PROD'N. FOR TEST PERIOD →	OIL--BBL.  79	GAS--MCF.  311	WATER--BBL.  5		GAS-OIL RATIO  3937
FLOW. TUBING PRESS.	CASING PRESSURE	CALCULATED 24-HOUR RATE  →	OIL-BBL.	GAS--MCF.	WATER--BBL.		OIL GRAVITY-API (CORR.)	
RECEIVED								

34. DISPOSITION OF GAS (Sold, used for fuel, vented, etc.)

Sold & Used for Fuel

35. LIST OF ATTACHMENTS

36. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records

SIGNED Brian Harris  
Brian Harris

TITLE Engineering Technician

DIV. OF OIL, GAS & MINING  
DATE 2/17/2003

BDH

\*(See Instructions and Spaces for Additional Data on Reverse Side)



37. SUMMARY OF POROUS ZONES: (Show all important zones of porosity and contents thereof; cored intervals, and all drill-stem, tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures, and recoveries);				38. GEOLOGIC MARKERS		
FORMATION	TOP	BOTTOM	DESCRIPTION, CONTENTS, ETC.	NAME	TOP	
					MEAS. DEPTH	TRUE VERT. DEPTH
			Well Name MB 2-2-9-16	Garden Gulch Mkr	4134'	
				Garden Gulch 2		
				Point 3 Mkr	4400'	
				X Mkr	4655'	
				Y-Mkr	4688'	
				Douglas Creek Mkr	4817'	
				BiCarbonate Mkr	5064'	
				B Limestone Mkr	5194'	
				Castle Peak	5669'	
				Basal Carbonate	6098'	
				Total Depth (LOGGERS	6115'	





February 17, 2003

State of Utah, Division of Oil, Gas and Mining  
Attn: Ms. Carol Daniels  
P.O. Box 145801  
Salt Lake City, Utah 84144-5801

Attn: Ms. Carol Daniels

Monument Butte 2-2-9-16 (43-013-32314)  
Duchesne County, UT

Dear Ms. Carol Daniels

Enclosed is a Well Completion or Recompletion Report and Log form (Form 3160-4). We are no longer sending Log copies since Dave Jull of Phoenix Surveys is already doing so.

If you should have any questions, please contact me at (303) 382-4449.

Sincerely,

Brian Harris  
Engineering Tech

Enclosures

cc: Bureau of Land Management  
Vernal District Office, Division of Minerals  
Attn: Edwin I. Forsman  
170 South 500 East  
Vernal, Utah 84078

Well File – Denver  
Well File – Roosevelt  
Patsy Barreau/Denver  
Bob Jewett/Denver  
Tara Eisler/Denver

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FEB 20 2003  
DIV. OF OIL, GAS & MINING



## STATE OF UTAH

## DIVISION OF OIL, GAS, AND MINING

<b>1. SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, deepen existing wells, or to reenter plugged and abandoned wells. Use "APPLICATION FOR PERMIT TO DRILL OR DEEPEN" form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NO.</b> <b>ML-21839</b>
<b>2. NAME OF OPERATOR</b> <b>INLAND PRODUCTION COMPANY</b>		<b>6. IF INDIAN, ALLOTTEE OR TRIBAL NAME</b>  <b>N/A</b>
<b>3. ADDRESS AND TELEPHONE NUMBER</b> <b>Rt. 3 Box 3630, Myton Utah 84052</b> <b>435-646-3721</b>		<b>7. UNIT AGREEMENT NAME</b>  <b>MONUMENT BUTTE</b>
<b>4. LOCATION OF WELL</b>  Footages <b>660 FNL 1980 FEL</b>  QQ, SEC, T, R, M: <b>NW/NE Section 2, T9S R16E</b>		<b>8. WELL NAME and NUMBER</b> <b>MONUMENT BUTTE 2-2-9-16</b>  <b>9. API NUMBER</b> <b>43-013-32314</b>  <b>10. FIELD AND POOL, OR WILDCAT</b>  <b>MONUMENT BUTTE</b>
		COUNTY <b>DUCHESNE</b> STATE <b>UTAH</b>

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT OR OTHER DATA	
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13. NAME & SIGNATURE: Mandie Crozier TITLE Regulatory Specialist DATE 11/13/2003

(This space for State use only)

Accepted by the  
Utah Division of  
Oil, Gas and Mining  
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NOV 17 2003  
DIV. OF OIL, GAS & MINING



ARTICLES OF AMENDMENT  
TO THE  
ARTICLES OF INCORPORATION  
OF  
INLAND PRODUCTION COMPANY

FILED  
In the Office of the  
Secretary of State of Texas  
SEP 02 2004  
Corporations Section

Pursuant to the provisions of Article 4.04 of the Texas Business Corporation Act (the "TBCA"), the undersigned corporation adopts the following articles of amendment to the articles of incorporation:

ARTICLE 1 – Name

The name of the corporation is Inland Production Company.

ARTICLE 2 – Amended Name

The following amendment to the Articles of Incorporation was approved by the Board of Directors and adopted by the shareholders of the corporation on August 27, 2004.

The amendment alters or changes Article One of the Articles of Incorporation to change the name of the corporation so that, as amended, Article One shall read in its entirety as follows:

"ARTICLE ONE – The name of the corporation is Newfield Production Company."

ARTICLE 3 – Effective Date of Filing

This document will become effective upon filing.

The holder of all of the shares outstanding and entitled to vote on said amendment has signed a consent in writing pursuant to Article 9.10 of the TBCA, adopting said amendment, and any written notice required has been given.

IN WITNESS WHEREOF, the undersigned corporation has executed these Articles of Amendment as of the 1<sup>st</sup> day of September, 2004.

INLAND RESOURCES INC.

By: Susan G. Riggs  
Susan G. Riggs, Treasurer





## Office of the Secretary of State

The undersigned, as Secretary of State of Texas, does hereby certify that the attached is a true and correct copy of each document on file in this office as described below:

Newfield Production Company  
Filing Number: 41530400

Articles of Amendment

September 02, 2004

In testimony whereof, I have hereunto signed my name officially and caused to be impressed hereon the Seal of State at my office in Austin, Texas on September 10, 2004.



A handwritten signature in black ink, appearing to read "G. Connor".

Secretary of State



**OPERATOR CHANGE WORKSHEET****ROUTING**

1. GLH

2. CDW

3. FILE

Change of Operator (Well Sold)

Designation of Agent/Operator

**X Operator Name Change****Merger**

The operator of the well(s) listed below has changed, effective:

**9/1/2004****FROM: (Old Operator):**

N5160-Inland Production Company

Route 3 Box 3630

Myton, UT 84052

Phone: 1-(435) 646-3721

**TO: ( New Operator):**

N2695-Newfield Production Company

Route 3 Box 3630

Myton, UT 84052

Phone: 1-(435) 646-3721

**CA No.****Unit:****MONUMENT BUTTE (GR D)****WELL(S)**

NAME	SEC	TWN	RNG	API NO	ENTITY NO	LEASE TYPE	WELL TYPE	WELL STATUS
MONUMENT FED 7-34	34	080S	160E	4301331471	10835	Federal	WI	A
MONUMENT BUTTE 2-34	34	080S	160E	4301331745	10835	Federal	OW	S
MONUMENT BUTTE UNIT 16-34	34	080S	160E	4301331913	10835	Federal	OW	P
MONUMENT FED 2A-35	35	080S	160E	4301331437	10835	Federal	OW	P
MON FED 1A-35	35	080S	160E	4301331514	10835	Federal	WI	A
MONUMENT BUTTE FED 4A-35R	35	080S	160E	4301331585	10835	Federal	OW	P
MONUMENT BUTTE 3A-35	35	080S	160E	4301331738	10835	Federal	OW	P
MONUMENT BUTTE ST 6-36	36	080S	160E	4301331571	10835	State	OW	P
MONUMENT BUTTE 4-36	36	080S	160E	4301331573	10835	State	OW	P
MON BUTTE ST 1A-36	36	080S	160E	4301331599	10835	State	WI	A
MON BUTTE 1A-2-9-16	02	090S	160E	4301332313	10835	State	OW	P
MON BUTTE 2-2-9-16	02	090S	160E	4301332314	10835	State	OW	P
MON BUTTE 4-2-9-16	02	090S	160E	4301332315	10835	State	OW	P
MON BUTTE 6-2-9-16	02	090S	160E	4301332316	10835	State	OW	P

K  
K  
K**OPERATOR CHANGES DOCUMENTATION**

Enter date after each listed item is completed

1. (R649-8-10) Sundry or legal documentation was received from the **FORMER** operator on: 9/15/20042. (R649-8-10) Sundry or legal documentation was received from the **NEW** operator on: 9/15/20043. The new company was checked on the **Department of Commerce, Division of Corporations Database** on: 2/23/20054. Is the new operator registered in the State of Utah: YES Business Number: 755627-01435. If **NO**, the operator was contacted on:



6a. (R649-9-2)Waste Management Plan has been received on: IN PLACE  
6b. Inspections of LA PA state/fee well sites complete on: waived

7. **Federal and Indian Lease Wells:** The BLM and or the BIA has approved the merger, name change, or operator change for all wells listed on Federal or Indian leases on: BLM BIA

8. **Federal and Indian Units:**  
The BLM or BIA has approved the successor of unit operator for wells listed on: n/a

9. **Federal and Indian Communization Agreements ("CA"):**  
The BLM or BIA has approved the operator for all wells listed within a CA on: na/

10. **Underground Injection Control ("UIC")** The Division has approved UIC Form 5, **Transfer of Authority to Inject**, for the enhanced/secondary recovery unit/project for the water disposal well(s) listed on: 2/23/2005

#### DATA ENTRY:

1. Changes entered in the **Oil and Gas Database** on: 2/28/2005  
2. Changes have been entered on the **Monthly Operator Change Spread Sheet** on: 2/28/2005  
3. Bond information entered in RBDMS on: 2/28/2005  
4. Fee/State wells attached to bond in RBDMS on: 2/28/2005  
5. Injection Projects to new operator in RBDMS on: 2/28/2005  
6. Receipt of Acceptance of Drilling Procedures for APD/New on: waived

#### FEDERAL WELL(S) BOND VERIFICATION:

1. Federal well(s) covered by Bond Number: UT 0056

#### INDIAN WELL(S) BOND VERIFICATION:

1. Indian well(s) covered by Bond Number: 61BSBDH2912

#### FEE & STATE WELL(S) BOND VERIFICATION:

1. (R649-3-1) The **NEW** operator of any fee well(s) listed covered by Bond Number 61BSBDH2919  
2. The **FORMER** operator has requested a release of liability from their bond on: n/a\*  
The Division sent response by letter on: n/a

#### LEASE INTEREST OWNER NOTIFICATION:

3. (R649-2-10) The **FORMER** operator of the fee wells has been contacted and informed by a letter from the Division of their responsibility to notify all interest owners of this change on: n/a

#### COMMENTS:

\*Bond rider changed operator name from Inland Production Company to Newfield Production Company - received 2/23/05





February 12, 2008

Mr. Dan Jarvis  
State of Utah  
Division of Oil, Gas and Mining  
Post Office Box 145801  
Salt Lake City, Utah 84114-5801

UIC-344.3

RE: Permit Application for Water Injection Well  
Monument Butte 2-2-9-16  
Monument Butte Unit, Lease #ML-21839  
Section 2-Township 9S-Range 16E  
Duchesne County, Utah

Dear Mr. Jarvis:

Newfield Production Company herein requests approval to convert the Monument Butte #2-2-9-16 from a producing oil well to a water injection well in the Monument Butte Unit. I hope you find this application complete; however, if you have any questions or require additional information, please contact me at (303) 893-0102.

Sincerely,

A handwritten signature in black ink, appearing to read "Eric Sundberg". The signature is fluid and cursive, with a long horizontal stroke extending to the right.

Eric Sundberg  
Regulatory Analyst

RECEIVED  
MAR 03 2008  
DIV. OF OIL, GAS & MINING



**NEWFIELD PRODUCTION COMPANY**  
**APPLICATION FOR APPROVAL OF CLASS II INJECTION WELL**

**MONUMENT BUTTE #2-2-9-16**

**MONUMENT BUTTE UNIT**

**LEASE #ML-21839**

**February 12, 2008**

**RECEIVED**

**MAR 03 2008**

**DIV. OF OIL, GAS & MINING**



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ATTACHMENT A-1	WELL LOCATION PLAT
ATTACHMENT B	LIST OF SURFACE OWNERS WITHIN ONE-HALF MILE RADIUS
ATTACHMENT C	CERTIFICATION FOR SURFACE OWNER NOTIFICATION
ATTACHMENT E	WELLBORE DIAGRAM – MONUMENT BUTTE #2-2-9-16
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STATE OF UTAH  
DIVISION OF OIL, GAS AND MINING

APPLICATION FOR INJECTION WELL - UIC FORM 1

OPERATOR Newfield Production Company  
ADDRESS 1401 17th Street, Suite 1000  
Denver, Colorado 80202

Well Name and number: Monument Butte 2-2-9-16  
Field or Unit name: Monument Butte Unit Lease No. ML-21839  
Well Location: QQ NWNE section 2 township 9S range 16E county Duchesne

Is this application for expansion of an existing project? ..... Yes ☒ No ☐

Will the proposed well be used for: Enhanced Recovery? ..... Yes ☒ No ☐  
Disposal? ..... Yes ☐ No ☒  
Storage? ..... Yes ☐ No ☒

Is this application for a new well to be drilled? ..... Yes ☐ No ☒

If this application is for an existing well,  
has a casing test been performed on the well? ..... Yes ☐ No ☒

Date of test: \_\_\_\_\_

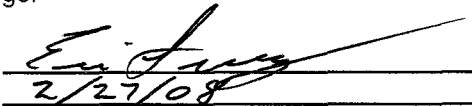
API number: 43-013-32314

Proposed injection interval: from 4400 to 6098  
Proposed maximum injection: rate 500 bpd pressure 2168 psig  
Proposed injection zone contains ☐ oil, ☐ gas, and/or ☐ fresh water within 1/2  
mile of the well.

IMPORTANT: Additional information as required by R615-5-2 should  
accompany this form.

List of Attachments: Attachments "A" through "H-1"

I certify that this report is true and complete to the best of my knowledge.

Name: Eric Sundberg Signature   
Title Regulatory Analyst Date 2/27/08  
Phone No: (303) 893-0102

(State use only)

Application approved by \_\_\_\_\_ Title \_\_\_\_\_  
Approval Date \_\_\_\_\_

Comments:



# Monument Butte #2-2-9-16

Spud Date: 08/28/2002  
Put on Production: 01/21/2003  
GL: 5475' KB: 5487'

Initial Production: 79 BOPD,  
311 MCFD, 5 BWPD,

## SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
LENGTH: 7 jts. (290.39')  
DEPTH LANDED: 298.39' KB  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 145 sxs Class "G" cmt, est 4 bbls cmt to surf.

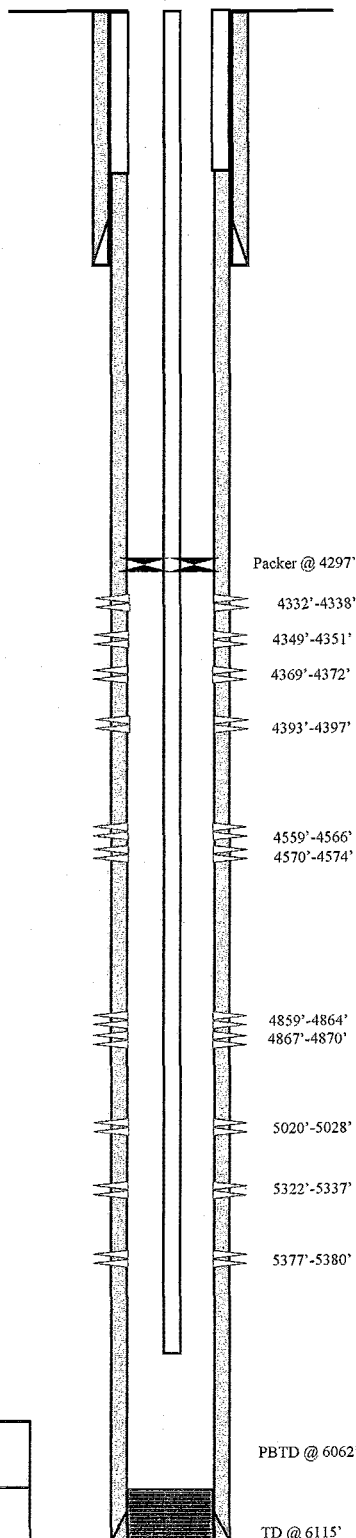
## PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 15.5#  
LENGTH: 143 jts. (6109.91')  
DEPTH LANDED: 6107.91' KB  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 275 sxs Prem. Lite II mixed & 500 sxs 50/50 POZ.  
CEMENT TOP AT: 216'

## TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 169 jts (5262.75')  
TUBING ANCHOR: 5274.75' KB  
NO. OF JOINTS: 3 jts (91.68')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 5369.23' KB  
NO. OF JOINTS: 2 jt (63.06')  
TOTAL STRING LENGTH: EOT @ 5433.84'

## Proposed Injection Wellbore Diagram



## FRAC JOB

Date	Depth Range	Fracture Job Details
1/16/03	5322'-5380'	<b>Frac A1&amp; A3 sands as follows:</b> 88,884# 20/40 sand in 650 bbls Viking I-25 fluid. Treated @ avg press of 2243 psi w/avg rate of 24.5 BPM. ISIP- 2230 psi. Calc. Flush: 5322 gal. Actual Flush: 5250 gal.
1/16/03	4859'-5028'	<b>Frac D1 &amp; C sands as follows:</b> 68,788# 20/40 sand in 540 bbls Viking I-25 fluid. Treated @ avg press of 2134 psi w/avg rate of 26.4 BPM. ISIP- 2200 psi. Calc flush: 4859 gal. Actual flush: 4767 gal.
1/16/03	4332'-4574'	<b>Frac PB10, GB6 &amp; GB4 sands as follows:</b> 65,544# 20/40 sand in 519 bbls Viking I-25 fluid. Treated @ avg press of 2094 psi w/avg rate of 24.6 BPM. ISIP 2390 psi. Calc flush: 4332 gal. Actual flush: 4242 gal.

## PERFORATION RECORD

Date	Depth Range	Tool Joint	Holes
1/15/03	5322'-5337'	2 JSPF	30 holes
1/15/03	5377'-5380'	4 JSPF	12 holes
1/16/03	4859'-4864'	4 JSPF	20 holes
1/16/03	4867'-4870'	4 JSPF	12 holes
1/16/03	5020'-5028'	4 JSPF	32 holes
1/16/03	4332'-4338'	4 JSPF	24 holes
1/16/03	4349'-4351'	4 JSPF	8 holes
1/16/03	4369'-4372'	4 JSPF	12 holes
1/16/03	4393'-4397'	4 JSPF	16 holes
1/16/03	4559'-4566'	4 JSPF	28 holes
1/16/03	4570'-4574'	4 JSPF	16 holes

**NEWFIELD**

**Monument Butte**  
660' FNL & 1980' FEL  
NWNE Section 02-T9S-R16E  
Duchesne Co, Utah  
API #43-013-32314; Lease #ML-21839



## **WORK PROCEDURE FOR INJECTION CONVERSION**

1. Rig up hot oil truck to casing. Pump water. Unseat pump. Flush rods. Trip out of hole with rods and pump.
2. Trip out of hole with tubing, breaking and doping every connection. Trip in hole with packer and tubing. Rig up water truck to casing. Pump packer fluid. Set packer.
3. Test casing and packer.
4. Rig down and move out.



**REQUIREMENTS FOR INJECTION OF FLUIDS INTO RESERVOIRS**  
**RULE R615-5-1**

1. **Operations to increase ultimate recovery, such as cycling of gas, the maintenance of pressure, the introduction of gas, water or other substances into a reservoir for the purpose of secondary or other enhanced recovery or for storage and the injection of water into any formation for the purpose of water disposal shall be permitted only by order of the Board after notice and hearing.**
2. **A request for agency action for authority for the injection of gas, liquified petroleum gas, air, water or any other medium into any formation for any reason, including but not necessarily limited to the establishment of or the expansion of waterflood projects, enhanced recovery projects, and pressure maintenance projects shall contain:**
  - 2.1 **The name and address of the operator of the project.**

Newfield Production Company  
1401 17<sup>th</sup> Street, Suite 1000  
Denver, Colorado 80202
  - 2.2 **A plat showing the area involved and identifying all wells, including all proposed injection wells, in the project area and within one-half mile of the project area.**

See Attachment A.
  - 2.3 **A full description of the particular operation for approval is requested.**

Approval is requested to convert the Monument Butte #2-2-9-16 from a producing oil well to a water injection well in Monument Butte Unit.
  - 2.4 **A description of the pools from which the identified wells are producing or have produced.**

The proposed injection well will inject into the Green River Formation.
  - 2.5 **The names, description and depth of the pool or pools to be affected.**

The injection zone is in the Green River Formation. For the Monument Butte #2-2-9-16 well, the proposed injection zone is from Garden Gulch to Basal Carbonate (4400' - 6098'). The confining strata directly above and below the injection zones are the Garden Gulch and the top of the Wasatch Formation or the bottom hole depth, which ever is shallower. The Garden Gulch Marker top is at 4134' and the TD is at 6115'.
  - 2.6 **A copy of a log of a representative well completed in the pool.**

The referenced log for the Monument Butte #2-2-9-16 is on file with the Utah Division of Oil, Gas and Mining.



- 2.7 A statement as to the type of fluid to be used for injection, its source and the estimated amounts to be injected daily.**

The primary type and source of fluid to be used for injection will be culinary water commingled with produced water. The average estimated injection of fluids will be at a rate of 300 BPD, and the estimated maximum injection will be at a rate of 500 BPD.

- 2.8 A list of all operators and surface owners within one-half mile radius of the proposed project.**

See Attachment B.

- 2.9 An affidavit certifying that said operators or owners and surface owners within a one-half mile radius have been provided a copy of the petition for injection.**

See Attachment C.

- 2.10 Any additional information the Board may determine is necessary to adequately review the petition.**

Newfield Production Company will supply any additional information requested by the Utah Division of Oil, Gas and Mining.

- 4.0 Establish recovery projects may be expanded and additional wells placed on injection only upon authority from the Board after notice and hearing or by administrative approval.**

This proposed injection well is on a State lease (Lease #ML-21839) in the Monument Butte Unit, and this request is for administrative approval.



**REQUIREMENTS FOR CLASS II INJECTION WELLS INCLUDING WATER DISPOSAL,  
STORAGE AND ENHANCED RECOVERY WELLS  
SECTION V – RULE R615-5-2**

1. Injection well shall be completed, equipped, operated, and maintained in a manner that will prevent pollution and damage to any USDW, or other resources and will confine injected fluids to the interval approved.
2. The application for an injection well shall include a properly completed Form DOGM-UIC-1 and the following:

- 2.1 A plat showing the location of the injection well, all abandoned or active wells within a one-half mile radius of the proposed wells, and the surface owner and the operator of any lands or producing leases, respectively, within a one-half mile radius of the proposed injection well.

See Attachments A and B.

- 2.2 Copies of electrical or radioactive logs, including gamma ray logs, for the proposed well run prior to the installation of casing and indicating resistivity, spontaneous potential, caliper and porosity.

All logs are on file with the Utah Division of Oil, Gas and Mining.

- 2.3 A copy of a cement bond or comparable log run for the proposed injection well after casing was set and cemented.

A copy of the cement bond log is on file with the Utah Division of Oil, Gas and Mining.

- 2.4 Copies of logs already on file with the Division should be referenced, but need not be refiled.

All copies of logs are on file with the Utah Division of Oil, Gas and Mining.

- 2.5 A description of the casing or proposed casing program of the injection well and of the proposed method for testing the casing before use of the well.

The casing program is 8-5/8", 24#, J-55 surface casing run to 298' KB, and 5-1/2" 15.5# J-55 casing run from surface to 6108' KB. A casing integrity test will be conducted at the time of conversion. See Attachment E.

- 2.6 A statement as to the type of fluid to be used for injection, its source and estimated amounts to be injected daily.

The primary type and source of fluid to be used for injection will be culinary water commingled with produced water. The estimated average rate of injection will be 300 BPD, and the estimated maximum rate of injection will be 500 BPD.

- 2.7 Standard laboratory analysis of the fluid to be injected, the fluid in the formation into which the fluid is being injected, and the compatibility of the fluids.

See Attachment F.



**The proposed average and maximum injection pressures.**

The proposed average injection pressure will be approximately 1100 psig and the maximum injection pressure will not exceed 2168 psig.

- 2.8 Evidence and data to support a finding that the proposed injection well will not initiate fractures through the overlying strata or a confining interval that could enable the injected fluid or formation fluid to enter the fresh water strata.**

The minimum fracture gradient for the Monument Butte #2-2-9-16, for existing perforations (4332' - 5380') calculates at 0.89 psig/ft. The maximum injection pressures will be limited so as not to exceed this gradient. A step rate test will be performed periodically to ensure we are below parting pressure. The proposed maximum injection pressure is 2168 psig. We may add additional perforations between 4400' and 6115'. See Attachments G and G-1.

- 2.9 Appropriate geological data on the injection interval and confining beds, including the geologic name, lithologic description, thickness, depth, and lateral extent.**

In the Monument Butte #2-2-9-16, the proposed injection zone (4400' - 6115') is in the Garden Gulch to Basal limestone members of the Green River Formation. The reservoir is a very fine-grained sandstone with minor imbedded shale streaks. The estimated porosity is 13%. The members are composed of porous and permeable lenticular calcareous sandstone and low porosity carbonates and calcareous shale. The porous and lenticular sandstone varies in thickness from 0-31' and is confined to the Monument Butte Field. Outside the Monument Butte Field, the sandstone is composed of tight, very fine, silty, calcareous sandstone, less than 3' thick. The stratum confining the injection zone is composed of tight, moderately calcareous, sandy lacustrine shale. All of the confining strata are impermeable, and will effectively seal off the oil, gas, and water of the injection zone from any strata directly above or below it.

- 2.10 A review of the mechanical condition of each well within a one-half mile radius of the proposed injection well to assure that no conduit exists that could enable fluids to migrate up or down the wellbore and enter the improper intervals.**

See Attachments E through E-9.

Additionally, the injection system will be equipped with high and low pressure shut down devices that will automatically shut in injection waters if a system blockage or leakage occurs. One way check valves will also ensure proper flow management. Relief valves will also be utilized for high-pressure relief.

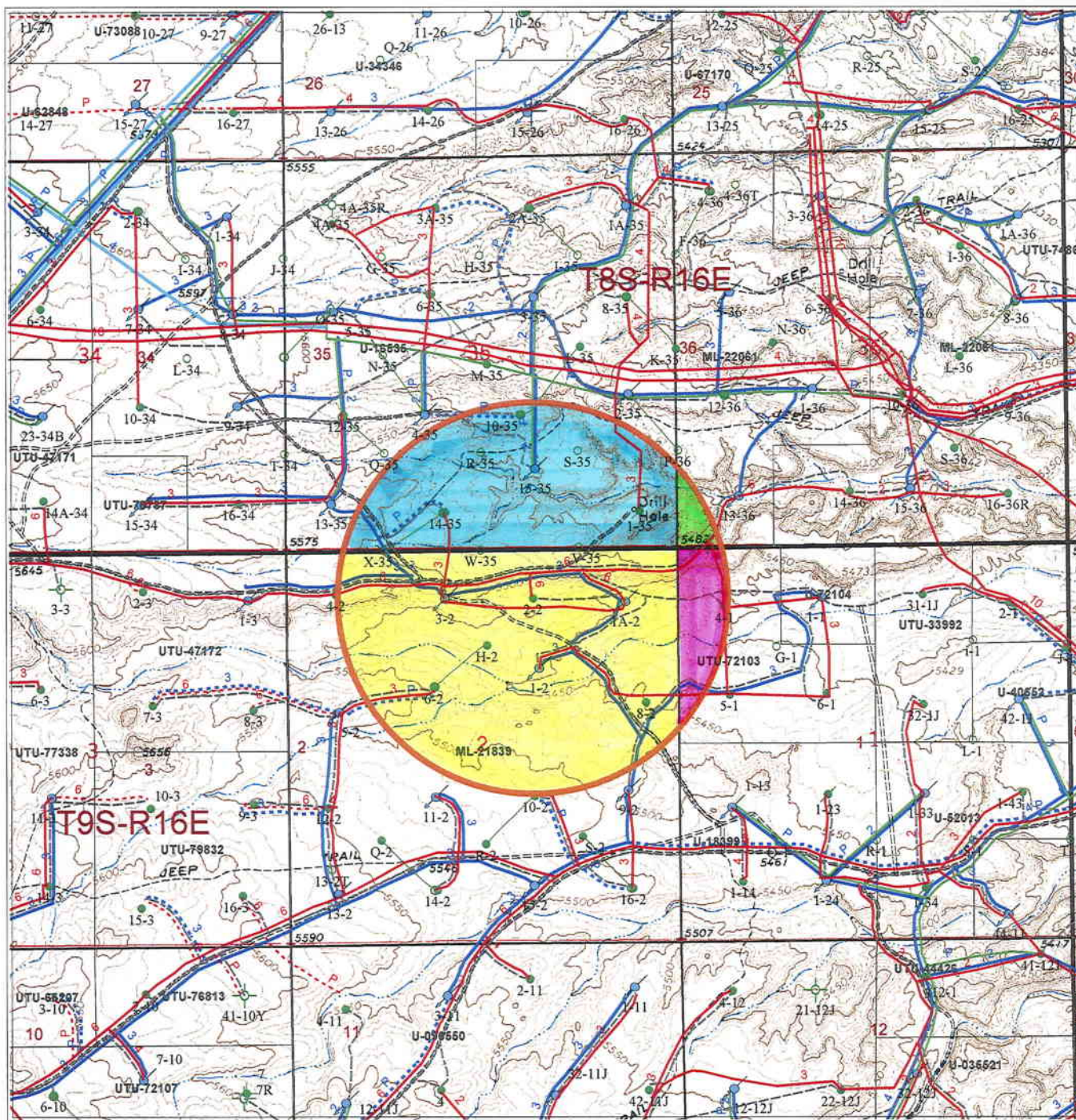
- 2.11 An affidavit certifying that a copy of the application has been provided to all operators or owners, and surface owners within a one-half mile radius of the proposed injection well.**

See Attachment C.

- 2.12 Any other information that the Board or Division may determine is necessary to adequately review the application.**

Newfield Production Company will supply any requested information to the Board or Division.





**Well Status**

- Location
- ⊕ CTI
- ① Surface Spud
- ⊙ Drilling
- ⊙ Waiting on Completion
- Producing Oil Well
- ⚙ Producing Gas Well
- ⚙ Water Injection Well
- ⊙ Dry Hole
- ⊙ Temporarily Abandoned
- ⊙ Plugged & Abandoned
- ⊙ Shut In

**Countyline**

**Injection system**

- high pressure
- - - low pressure
- ⋯ proposed
- return
- - - return proposed

**Gas Pipelines**

- Gathering lines
- - - Proposed lines

**Leases**

- 2-2-9-16 1/2 mile radius

HL-21839  
u-72103  
u-16535  
HL-22041

## Attachment A

Mon Butte 2-2-9-16  
Section 2, T9S-R16E



## 1/2 Mile Radius Map

### Duchesne County

Alamo Plaza Building  
1401 17th Street Suite 1000  
Denver, Colorado 80202-1247  
Phone: (303) 893-0102

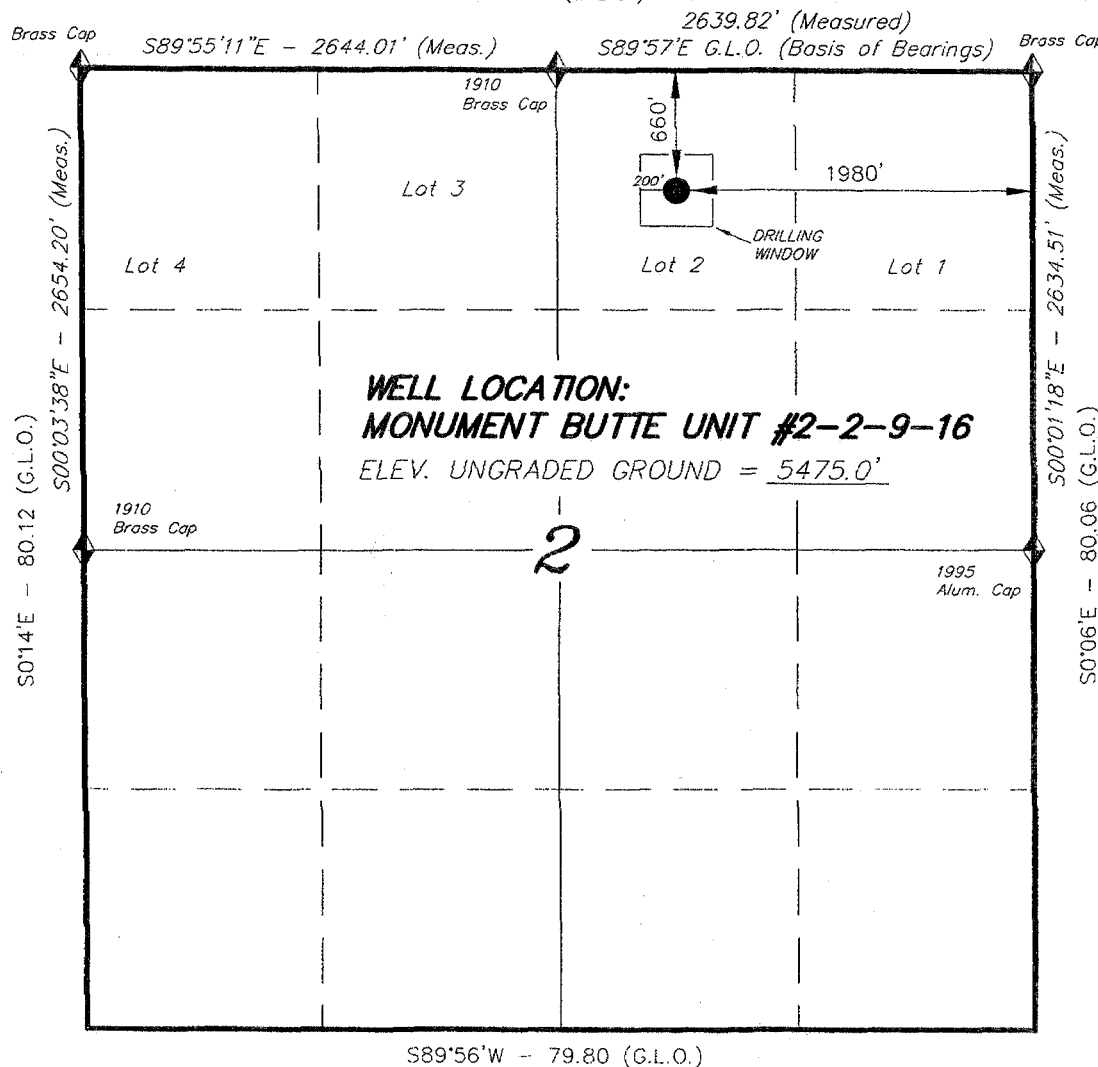
February 6, 2008



**T9S, R16E, S.L.B.&M.**

S89°57'E (G.L.O.)

**INLAND PRODUCTION COMPANY**

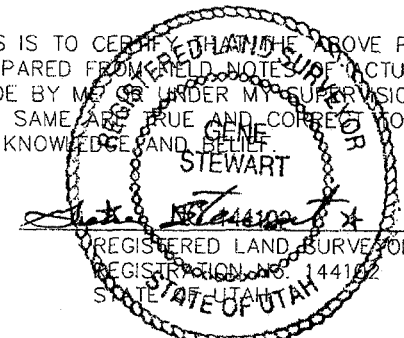


WELL LOCATION, MONUMENT BUTTE UNIT  
#2-2-9-16, LOCATED AS SHOWN IN  
LOT 2 OF SECTION 2, T9S, R16E,  
S.L.B.&M. DUCHESNE COUNTY, UTAH.

*Attached A-1*



THIS IS TO CERTIFY THAT THE ABOVE PLAT WAS  
PREPARED FROM FIELD NOTES OF ACTUAL SURVEYS  
MADE BY ME OR UNDER MY SUPERVISION AND THAT  
THE SAME ARE TRUE AND CORRECT TO THE BEST OF  
MY KNOWLEDGE AND BELIEF.



◆ = SECTION CORNERS LOCATED

BASIS OF ELEV; U.S.G.S. 7-1/2 min QUAD (MYTON SE)

**TRI STATE LAND SURVEYING & CONSULTING**

38 WEST 100 NORTH - VERNAL, UTAH 84078  
(435) 781-2501

SCALE: 1" = 1000'	SURVEYED BY: G.S. D.J.S.
DATE: 10-3-01	DRAWN BY: J.R.S.
NOTES:	FILE #



# EXHIBIT B

Page 1

#	Land Description	Minerals Ownership & Expires	Minerals Leased By	Surface Rights
1	Township 9 South, Range 16 East Section 2: All	ML-21839 HBP	Newfield Production Company Davis Bros LLC Davis Resources Beverly Sommer Texas General Offshore Inc. International Drilling Services Raymond H. Brennan Marian Brennan Deer Valley Ltd. AGK Energy LLC. Jasper N. Warren Thomas I Jackson	(Surface Rights) St. of Utah
2	Township 8 South, Range 16 East Section 34: NE/4, N/2SE/4, SE/4SE/4	U-16535 HBP	Newfield Production Company Davis Bros LLC. Beverly Sommer Davis Resources Texas General Offshore Inc. International Drilling Services Raymond H. Brennan Whitehall Energy Corp. Marian Brennan Deer Valley LTD. AGK Energy LLC. Jasper Warren Thomas I. Jackson	(Surface Rights) USA



# EXHIBIT B

Page 2

#	Land Description	Minerals Ownership & Expires	Minerals Leased By	Surface Rights
3	Township 9 South, Range 16 East Section 1: Lot 4, S2NW	U-72103 HBP	Newfield Production Company Davis Bros LLC Davis Resources	(Surface Rights) USA
4	Township 8 South, Range 16 East Section 36: ALL	ML-22061 HBP	Newfield Production Company Davis Bros LLC Beverly Sommer Davis Resources Texas General Offshore Inc. International Drilling Services Raymond H. Brennan Marian Brennan Deer Valley LTD. AGK Energy LLC. Jasper Warren Thomas I. Jackson	(Surface Rights) St. of Utah

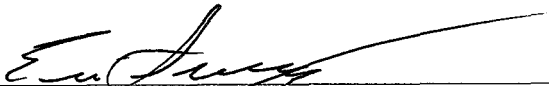


ATTACHMENT C

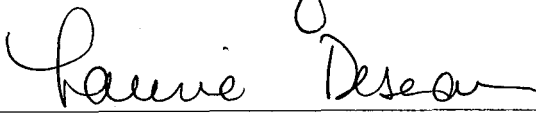
CERTIFICATION FOR SURFACE OWNER NOTIFICATION

RE: Application for Approval of Class II Injection Well  
Monument Butte #2-2-9-16

I hereby certify that a copy of the injection application has been provided to all surface owners within a one-half mile radius of the proposed injection well.

Signed:   
Newfield Production Company  
Eric Sundberg  
Regulatory Analyst

Sworn to and subscribed before me this 2<sup>nd</sup> day of February, 2008.

Notary Public in and for the State of Colorado: 

My Commission Expires: 05/05/2009



## Monument Butte #2-2-9-16

Spud Date: 08/28/2002  
 Put on Production: 01/21/2003  
 GL: 5475' KB: 5487'

Initial Production: 79 BOPD,  
 311 MCFD, 5 BWPD,

## Wellbore Diagram

SURFACE CASING

CSG SIZE: 8-5/8"  
 GRADE: J-55  
 WEIGHT: 24#  
 LENGTH: 7 jts. (290.39')  
 DEPTH LANDED: 298.39' KB  
 HOLE SIZE: 12-1/4"  
 CEMENT DATA: 145 sxs Class "G" cmt, est 4 bbls cmt to surf.

Cement top@  
 216'

PRODUCTION CASING

CSG SIZE: 5-1/2"  
 GRADE: J-55  
 WEIGHT: 15.5#  
 LENGTH: 143 jts. (6109.91')  
 DEPTH LANDED: 6107.91' KB  
 HOLE SIZE: 7-7/8"  
 CEMENT DATA: 275 sxs Prem. Lite II mixed & 500 sxs 50/50 POZ.  
 CEMENT TOP AT: 216'

TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
 NO. OF JOINTS: 169 jts (5262.75')  
 TUBING ANCHOR: 5274.75' KB  
 NO. OF JOINTS: 3 jts (91.68')  
 SEATING NIPPLE: 2-7/8" (1.10')  
 SN LANDED AT: 5369.23' KB  
 NO. OF JOINTS: 2 jt (63.06')  
 TOTAL STRING LENGTH: EOT @ 5433.84'

SUCKER RODS

POLISHED ROD: 1-1/2" x 22' SM  
 SUCKER RODS: 6 1-1/2" weight bars; 10-3/4" scraped rods; 98-3/4" plain rods, 99-3/4" scraped rods, 1-4"x3/4" pony rods, 1-2"x3/4" pony rods.  
 PUMP SIZE: 2-1/2" x 1-1/2" x 14' RHAC  
 STROKE LENGTH: 84"  
 PUMP SPEED, SPM: 4 SPM  
 LOGS: DIGL/SP/GR/CAL

FRAC JOB

1/16/03 5322'-5380' Frac A1 & A3 sands as follows:  
 88,884# 20/40 sand in 650 bbls Viking I-25 fluid. Treated @ avg press of 2243 psi w/avg rate of 24.5 BPM. ISIP- 2230 psi. Calc. Flush: 5322 gal. Actual Flush: 5250 gal.

1/16/03 4859'-5028' Frac D1 & C sands as follows:  
 68,788# 20/40 sand in 540 bbls Viking I-25 fluid. Treated @ avg press of 2134 psi w/avg rate of 26.4 BPM. ISIP- 2200 psi. Calc flush: 4859 gal. Actual flush: 4767 gal.

1/16/03 4332'-4574' Frac PB10, GB6 & GB4 sands as follows:  
 65,544# 20/40 sand in 519 bbls Viking I-25 fluid. Treated @ avg press of 2094 psi w/avg rate of 24.6 BPM. ISIP 2390 psi. Calc flush: 4332 gal. Actual flush: 4242 gal.

PERFORATION RECORD

1/15/03	5322'-5337'	2 JSFP	30 holes
1/15/03	5377'-5380'	4 JSFP	12 holes
1/16/03	4859'-4864'	4 JSFP	20 holes
1/16/03	4867'-4870'	4 JSFP	12 holes
1/16/03	5020'-5028'	4 JSFP	32 holes
1/16/03	4332'-4338'	4 JSFP	24 holes
1/16/03	4349'-4351'	4 JSFP	8 holes
1/16/03	4369'-4372'	4 JSFP	12 holes
1/16/03	4393'-4397'	4 JSFP	16 holes
1/16/03	4559'-4566'	4 JSFP	28 holes
1/16/03	4570'-4574'	4 JSFP	16 holes

SN @ 5369'

EOT @ 5434'

PBTD @ 6062'

SHOE @ 6108'

TD @ 6115'

**NEWFIELD**

**Monument Butte**  
 660' FNL & 1980' FEL  
 NWNE Section 02-T9S-R16E  
 Duchesne Co, Utah  
 API #43-013-32314; Lease #ML-21839



Attch. E-1

# Monument Butte Fed. #10-35-8-16

Spud Date: 8/29/1983  
Put on Production: 10/4/1983  
GL: 5534' KB: 5545'

Initial Production: 161 BOPD,  
NM MCFD, NM BWPD

Wellbore Diagram

## SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
DEPTH LANDED: 298'  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 210 sxs Class "G" cmt. to surface.

## PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 15.5#  
DEPTH LANDED: 5739'  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 150 sxs Hifill & 350 sxs Thixotropic.  
CEMENT TOP AT: 1488' per CBL.

## TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 162 jts (5244.20')  
TUBING ANCHOR: 5255.20'  
NO. OF JOINTS: 1 jts (29.65')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 5287.65' KB  
NO. OF JOINTS: 1 jts (29.65')  
TOTAL STRING LENGTH: EOT @ 5318.85'

## SUCKER RODS

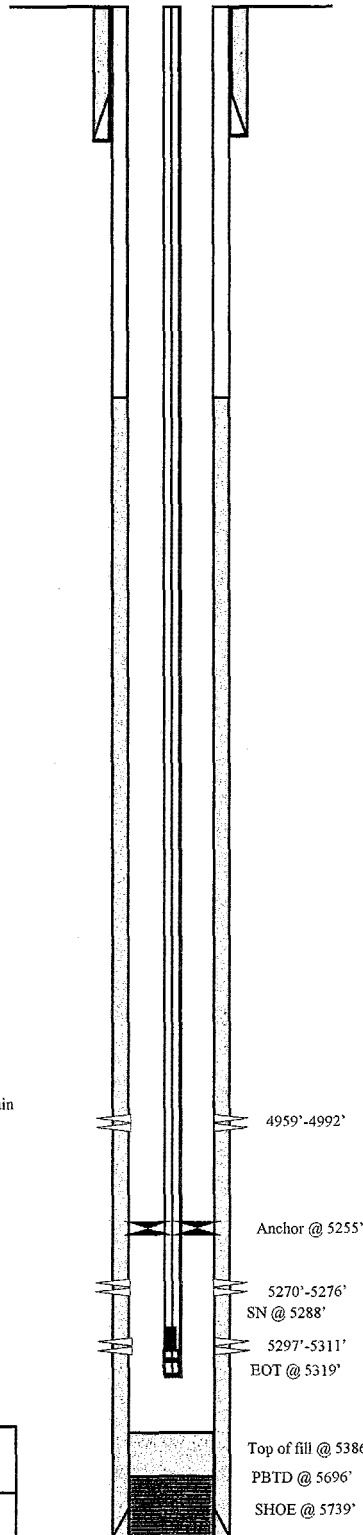
POLISHED ROD: 1-1/2" x 22' SM  
SUCKER RODS: 4-1 1/2" weight bars; 6-3/4" scraped rods; 95-3/4" plain rods, 105-3/4" scraped rods, 1-2' x 3/4" pony rod.  
PUMP SIZE: 2-1/2" x 1-1/2" x 14 1/2' RHAC  
STROKE LENGTH: 74"  
PUMP SPEED: SPM: 8 SPM  
LOGS: DIGL/SP/GR/CAL

## FRAC JOB

9/28/83	4959'-4992'	<b>Frac D-1 zone as follows:</b> 164,000# 20/40 sand in 1166 bbls fluid. Treated @ avg press of 2100 psi w/avg rate of 31 BPM. ISIP 2400 psi.
2/06/91	5270'-5311'	<b>Frac B-2 zone as follows:</b> 51,221# 20/40 sand in 1023 bbls fluid. Treated @ avg press of 3800 psi w/avg rate of 17 BPM. ISIP 1800 psi.
1/16/02		Pump change. Update rod and tubing details.
6/30/03		Pump change. Update rod and tubing details.
1/6/04		Zone Clean Up. Update rod and tubing detail.
2/13/04		Pump Change. Update tubing details.

## PERFORATION RECORD

9/28/83	4959'-4992'	4 JSPF	132 holes
2/06/91	5270'-5276'	4 JSPF	24 holes
2/06/91	5297'-5311'	4 JSPF	56 holes



**NEWFIELD**

**Monument Butte Fed. #10-35-8-16**

1825' FSL & 2137' FEL

NW/SE Section 35-T8S-R16E

Duchesne Co, Utah

API #43-013-30801; Lease #UTU-16535



Attch. E-2

# Monument Butte Fed. #14-35-8-16

Spud Date: 10/26/83  
Put on Production: 3/27/84  
GL: 5524' KB: 5537'

Initial Production: 43 BOPD,  
70 MCFD, 0 BWPD

Wellbore Diagram

## SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
DEPTH LANDED: 292'  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 210 sxs Class "G" cmt.

## PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 17#  
DEPTH LANDED: 5771'  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 250 sxs Lodense & 275 sxs Thixotropic.  
CEMENT TOP AT: 1510' per CBL

## TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 163 jts (5360.83')  
TUBING ANCHOR: 5373.83'  
NO. OF JOINTS: 2 jts (61.56')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 5438.63' KB  
NO. OF JOINTS: 1 jts (30.97')  
TOTAL STRING LENGTH: EOT @ 5471.15'

## SUCKER RODS

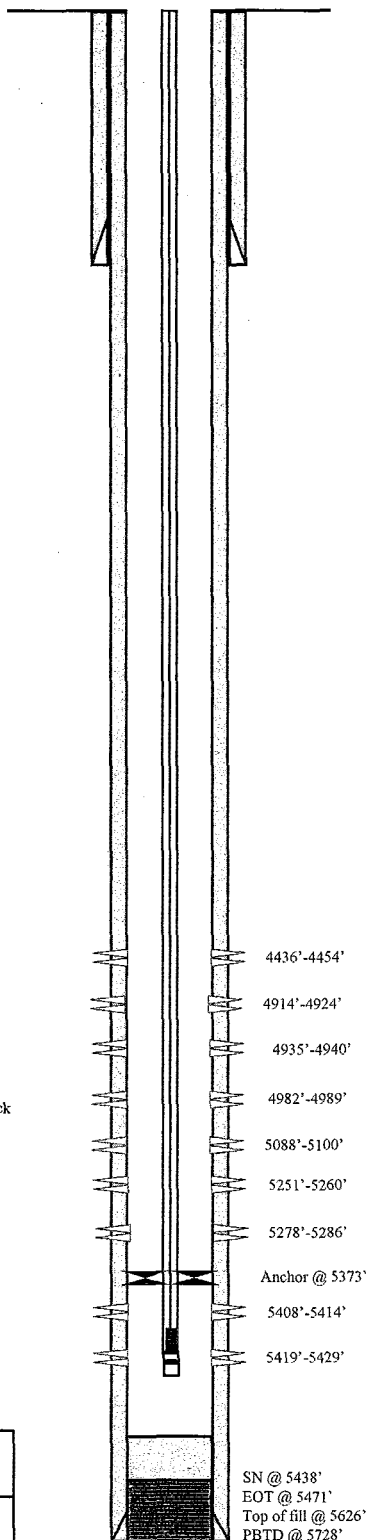
POLISHED ROD: 1-1/2" x 22' SM  
SUCKER RODS: 4-1 1/2" weight bars; 10-3/4" scraper rods; 102-3/4" slick rods, 100-3/4" scraper rods, 1-4", 1-8" x 3/4" pony rods.  
PUMP SIZE: 2-1/2" x 1-1/2" x 16" RHAC  
STROKE LENGTH: 72"  
PUMP SPEED, SPM: 5 SPM  
LOGS: DIGL/SP/GR/CAL

## FRAC JOB

11/10/83	5408'-5429'	<b>Frac A1 sand as follows:</b> 146,440# 20/40 sand in 980 bbls frac fluid. Treated @ avg press of 2500 psi w/avg rate of 41.5 BPM. ISIP 1820 psi. Calc. flush: 5408 gal., Actual flush: 5400 gal.
3/24/84	4914'-4940'	<b>Frac D1 sand as follows:</b> 83,500# 20/40 sand in 619 bbls frac fluid. Treated @ avg press of 2100 psi w/avg rate of 30 BPM. ISIP 1900 psi. Calc. flush: 4914 gal., Actual flush: 4800 gal.
8/28/90	5251'-5286'	<b>Frac B2 sand as follows:</b> 13,000# 20/40 sand + 17,000# 16/30 sand in 642 bbls frac fluid. Treated @ avg press of 3350 psi, ISIP 1710 psi. Calc. flush: 1336 gal., Actual flush: 1335 gal.
8/30/90	5088'-5100'	<b>Frac C-sd as follows:</b> 34,000# 20/40 sand in 680 bbls frac fluid. Treated @ avg press of 3450 psi, ISIP 2220 psi. Calc. flush: 1284 gal., Actual flush: 1281 gal.
8/31/90	4914'-4989'	<b>Frac D1 &amp; D2 as follows:</b> 24,000# 20/40 sand + 45,000# 16/30 sand in 497 bbls frac fluid. Treated @ avg press of 3400 psi, ISIP 2000 psi. Calc. flush: 1235 gal., Actual flush: 1386 gal.
5/24/01	4436'-4454'	<b>Frac GB-6 sand as follows:</b> 101,440# 20/40 sand in 426 bbls Viking I-25 fluid. Treated @ avg press of 2560 psi w/avg rate of 32 BPM. ISIP 2530 psi. Calc. flush: 4436 gal., Actual flush: 4326 gal.

## PERFORATION RECORD

11/09/83	5419'-5429'	1 SPF	10 holes
11/09/83	5408'-5414'	1 SPF	06 holes
3/21/84	4935'-4940'	1 SPF	11 holes
3/21/84	4914'-4924'	1 SPF	06 holes
8/25/90	5278'-5286'	4 SPF	32 holes
8/25/90	5251'-5260'	4 SPF	36 holes
8/25/90	5088'-5100'	4 SPF	48 holes
8/25/90	4982'-4989'	4 SPF	28 holes
8/25/90	4935'-4940'	4 SPF	20 holes
8/25/90	4914'-4924'	4 SPF	40 holes
5/25/01	4436'-4454'	4 SPF	72 holes



SN @ 5438'  
EOT @ 5471'  
Top of fill @ 5626'  
PBTD @ 5728'  
TD @ 5800'



Inland Resources Inc.

Monument Butte Fed. #14-35-8-16

511' FSL & 2134' FWL

SESU Section 35-T8S-R16E

Duchesne Co, Utah

API #43-013-30812; Lease #U-16535



Alt. E-3

Spud Date: 9/8/1990  
Put on Production: 10/20/1990  
Put on Injection: 8/31/91  
GL: 5498' KB: 5508'

# Monument Butte Fed. #15-35

Initial Production: 124 BOPD,  
60 MCFD, 8 BWPD

## SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
LENGTH: 7 jts. 295'  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 215 sxs Class "G" cmt.

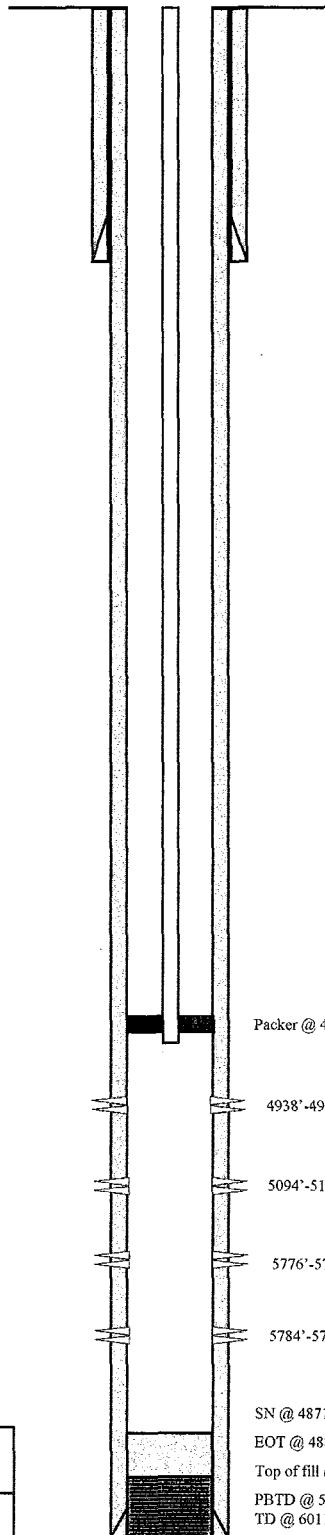
## PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 15.5#  
LENGTH: 147 jts. 6011'  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 542 sxs Pacesetter Lite & 295 sxs Class "G".  
CEMENT TOP AT: ? per CBL

## TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 154 jts (4855.95')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 4871.95' KB  
TUBING PACKER: 4873.55'  
TOTAL STRING LENGTH: EOT @ 4880.82'

## Injection Wellbore Diagram



## FRAC JOB

10/2/90	5776'-5786'	<b>Frac CP-1 sands as follows:</b> 32,270# 20/40 sand + 50,602# 16/30 sand in 847 bbls frac fluid. Treated @ avg press of 2200 psi w/avg rate of 40 BPM. ISIP 2000 psi. Calc. flush: 5776 gal. Actual flush: 5628 gal.
10/9/90	5101'-5109'	<b>Frac C sands as follows:</b> 22,950# 20/40 sand + 32,287# 16/30 sand in 608 bbls frac fluid. Treated @ avg press of 2400 psi w/avg rate of 40 BPM. ISIP 2350 psi. Calc. flush: 5101 gal. Actual flush: 4970 gal.
8/01/91	4946'-4953'	<b>Frac D-1 sands as follows:</b> 27,000# 16/30 sand in 275 bbls frac fluid. Treated @ avg press of 2250 psi w/avg rate of 20 BPM. ISIP 2100 psi. Calc. flush: 4946 gal. Actual flush: 4788 gal.
10/31/01		Re-perf C-sds and D-1 sands.
11/2/01		Return to injection.

## PERFORATION RECORD

9/29/90	5776'-5782'	4 SPF	24 holes
9/29/90	5784'-5786'	4 SPF	08 holes
10/8/90	5101'-5109'	4 SPF	32 holes
8/01/91	4946'-4953'	4 SPF	28 holes
10/31/01	4938'-4958'	4 SPF	80 holes
10/31/01	5094'-5110'	4 SPF	64 holes



**Inland Resources Inc.**

### Monument Butte Fed. #15-35

1092' FSL & 1934' FEL  
SWSE Section 35-T8S-R16E  
Duchesne Co, Utah  
API #43-013-31264; Lease #U-16535



A Hum. E-4

# Monument Butte Fed. #1-35

Spud Date: 3/19/81  
Put on Production: 4/21/81  
GL: 5482' KB: 5491'

Initial Production: 37 BOPD,  
19 MCFG, 0 BWPD

Wellbore Diagram

## SURFACE CASING

CSG SIZE: 9-5/8"  
GRADE:  
WEIGHT: 36#  
LENGTH: 249'  
HOLE SIZE: 14-3/4"  
CEMENT DATA: 100 sxs Lite cmt. + 190 sxs Class "G".

## PRODUCTION CASING

CSG SIZE: 5-1/2" / J-55 / 15.5#  
LENGTH: 5563'  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 700 sxs 50/50 POZ.  
CEMENT TOP AT: 1460' per CBL

## TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 177 jts (5397.57')  
TUBING ANCHOR: 5406.57'  
NO. OF JOINTS: 2 jts (60.85')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 5470.22' KB  
NO. OF JOINTS: 1 jt (30.37')  
TOTAL STRING LENGTH: EOT @ 5502.14'

## SUCKER RODS

POLISHED ROD: 1-1/2" x 22' Polished Rod  
SUCKER RODS: 1-8", 1-6"x 3/4" pony rods, 101-3/4" guided rods (top 30 new)  
86-3/4" plain rods, 25-3/4" guided rods, (top 15 new) 6-1 1/2" weight rods  
PUMP SIZE: 2-1/2" x 1-1/2" x 15 1/2" RHAC  
STROKE LENGTH: 86"  
PUMP SPEED, SPM: 4 SPM

## FRAC JOB

4/18/81	5428'-5441'	<b>Frac A3 sand as follows:</b> 10,500# 20/40 sand, 5,000# 13/20 sand in 469 bbls. of diesel. Avg. treating pressure 5100 psi @ 15 BPM. ISIP 2100 psi.
10/17/81	4869'-5205'	<b>Frac D, C, B sands as follows:</b> 95,500# 20/40 sand in 452 bbls. gelled diesel. Avg. treating press. 3800 psi @ 20 BPM. ISIP 2190 psi.
10/21/81	4708'-4748'	<b>Frac Stray sands as follows:</b> 95,500# 20/40 sand in 393 bbls. gelled diesel. Avg. treating press. 4600 psi @ 20 BPM. ISIP 2800 psi.
May 1996		Last reported production.
2/04/02		Reperf and new perfs. Return to production.
07/21/06		Parted Rods. Tubing & Rod Detail Updated.

## PERFORATION RECORD

04/18/81	5438-5441'	2 SPF
04/18/81	5428-5431'	2 SPF
10/17/81	5202'-5205'	1 SPF
10/17/81	5116'-5117'	1 SPF
10/17/81	4911'-4916'	1 SPF
10/17/81	4869'-4870'	1 SPF
10/20/81	4746'-4748'	1 SPF
10/20/81	4714'-4722'	1 SPF
10/20/81	4708'-4710'	1 SPF
2/04/02	4911'-4918'	4 SPF
2/04/02	5072'-5074'	4 SPF
2/04/02	5132'-5140'	4 SPF
2/04/02	5201'-5207'	4 SPF
2/04/02	5422'-5433'	4 SPF
2/04/02	5436'-5443'	4 SPF
2/04/02	5462'-5479'	4 SPF
2/04/02	5485'-5488'	4 SPF

Bridge plug milled and pushed to PBTD 5547' (4/17/91)

SN @ 5470'  
EOT @ 5502'  
Top of fill @ 5531'  
PBTD @ 5547'  
TD @ 5565'



**Inland Resources Inc.**

**Monument Butte Fed. #1-35**

506' FSL & 528' FEL

SESE Section 35-T8S-R16E

Duchesne Co, Utah

API #43-013-30561; Lease #U-16535



Alham - E-5

# Monument Butte St. #3-2-9-16

Spud Date: 11/25/82  
Put on Production: 1/12/83  
GL: 5519' KB:

Initial Production: 23 BOPD,  
23 MCFD, 3 BWPD

Injection Wellbore  
Diagram

## SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
LENGTH: 7 jts. (286')  
DEPTH LANDED : 283' KB  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 210 sxs Class "G" cmt. Returns to surface.

## PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 17# & 15.5#  
LENGTH: 131 jts. 17# & 16 jts. of 15.5#  
DEPTH LANDED: 5898'  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 380 sxs Class "G" cement  
CEMENT TOP AT: 3208' per CBL

## TUBING

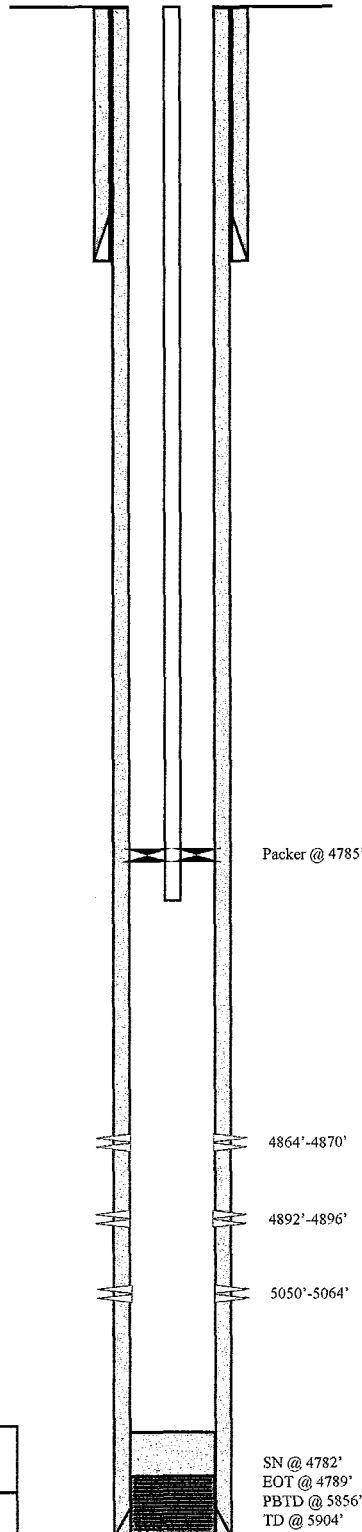
SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 146 jts (4767.28')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 4782.38' KB  
TUBING PACKER: 4785.58'  
TOTAL STRING LENGTH: EOT @ 4789.70'

## FRAC JOB

12/19/82	5050'-5064'	Frac as follows: 56,000# 20/40 sand in 345 frac fluid. Screened out.
1/11/92	4864'-4896'	Frac as follows: 29,800# 16/30 sand in 261 bbls gelled diesel. Screened out with approx. 26,000# into formation.

## PERFORATION RECORD

12/18/82	5050'-5064'	1 JSPF	14 holes
01/08/92	4864'-4870'	4 JSPF	28 holes
01/08/92	4892'-4896'	4 JSPF	20 holes



Inland Resources Inc.

Monument Butte St. #3-2-9-16

658' FNL & 2120' FWL

NENW Section 2-T9S-R16E

Duchesne Co, Utah

API #43-013-30627; Lease #ML-21839



Altam. E-6

# Monument Butte 1A-2-9-16

Spud Date: 08/16/2002  
Put on Production: 9/21/02  
GL: 5440' KB: 5450'

Initial Production: BOPD,  
MCFD, BWPD

## Wellbore Diagram

### SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
LENGTH: 7 jts. (293')  
DEPTH LANDED: 301' KB  
HOLE SIZE: 12 1/4"  
CEMENT DATA: 145 sxs Class "G" cmt, est 5 bbls cmt to surf.

### PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 15.5#  
LENGTH: 136 jts. (6070')  
DEPTH LANDED: 6068' KB  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 350 sxs Prem. Lite II mixed & 400 sxs 50/50 POZ.  
CEMENT TOP AT: 30'

### TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 183 jts (5754')  
TUBING ANCHOR: 5764' KB  
NO. OF JOINTS: 1 jts (31')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 5798' KB  
NO. OF JOINTS: 2 jts (63')  
TOTAL STRING LENGTH: EOT @ 5862' W/10' KB

### SUCKER RODS

POLISHED ROD: 1-1/2" x 22' SM  
SUCKER RODS: 1-8", 1-6", 1-2" x 3/4" pony rods, 100-3/4" scraped rods, 115-3/4" plain rods, 10-3/4" scraped rods, 6-1 1/2" weight bars.  
PUMP SIZE: 2-1/2" x 1-1/2" x 15.5' RHAC  
STROKE LENGTH: 86"  
PUMP SPEED, SPM: 4 SPM  
LOGS: DIGL/SP/GR/CAL

### FRAC JOB

9/18/02 5661'-5811' **Frac CP.5,2,3 sands as follows:**  
60,000# 20/40 sand in 260 bbls Viking I-25 fluid. Treated @ avg press of 1475 psi w/avg rate of 25.6 BPM. ISIP 1920 psi. Calc flush: 5661 gal. Actual flush: 5565 gal.

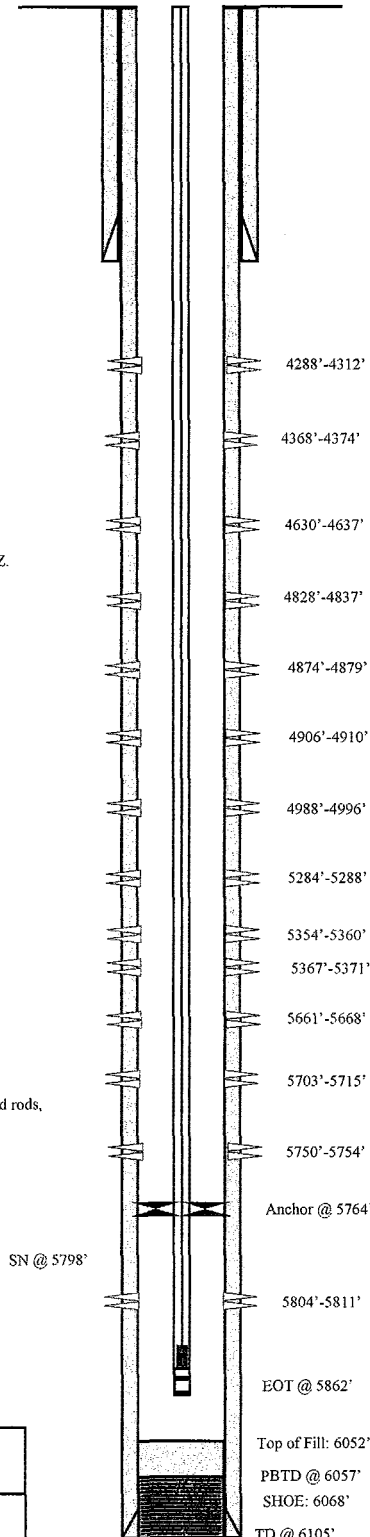
9/18/02 5284'-5371' **Frac A 1,3, sands as follows:**  
6000# 20/40 sand in 258 bbls Viking I-25 fluid. Treated @ avg press of 1850 psi w/avg rate of 25.7 BPM. ISIP 2080 psi. Calc flush: 5284 gal. Actual flush: 5208 gal.

9/18/02 4828'-4996' **Frac C/D sands as follows:**  
75,000# 20/40 sand in 337 bbls Viking I-25 fluid. Treated @ avg press of 1835 psi w/avg rate of 25.9 BPM. ISIP 2090 psi. Calc flush: 4828 gal. Actual flush: 4746 gal.

9/18/02 4288'-4637' **Frac X/GB 4,6 sands as follows:**  
96,480# 20/40 sand in 391 bbls Viking I-25 fluid. Treated @ avg press of 1685 psi w/avg rate of 25.7 BPM. ISIP 1980 psi. Calc flush: 4288 gal. Actual flush: 4200 gal.

### PERFORATION RECORD

9/18/02	5804'-5811'	4 JSPF	28 holes
9/18/02	5750'-5754'	4 JSPF	16 holes
9/18/02	5703'-5715'	4 JSPF	48 holes
9/18/02	5661'-5668'	4 JSPF	28 holes
9/18/02	5367'-5371'	4 JSPF	16 holes
9/18/02	5354'-5360'	4 JSPF	24 holes
9/18/02	5284'-5288'	4 JSPF	16 holes
9/18/02	4988'-4996'	4 JSPF	32 holes
9/18/02	4906'-4910'	4 JSPF	16 holes
9/18/02	4874'-4879'	4 JSPF	20 holes
9/18/02	4828'-4837'	4 JSPF	36 holes
9/18/02	4630'-4637'	4 JSPF	28 holes
9/18/02	4368'-4374'	4 JSPF	24 holes
9/18/02	4288'-4312'	2 JSPF	48 holes



Inland Resources Inc.

Monument Butte #1A-2-9-16

714' FNL & 728' FEL

NE/NE Section 2-T9S-R16E

Duchesne Co, Utah

API #43-013-32313; Lease #ML-21839



Attch. E-7

# Monument Butte St. #1-2-9-16

Spud Date: 8/25/81  
Put on Production: 11/6/81

GL: 5457' KB: 5469'

## SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
LENGTH: 7 jts. (295')  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 180 sxs Class "G" cement.

## PRODUCTION CASING

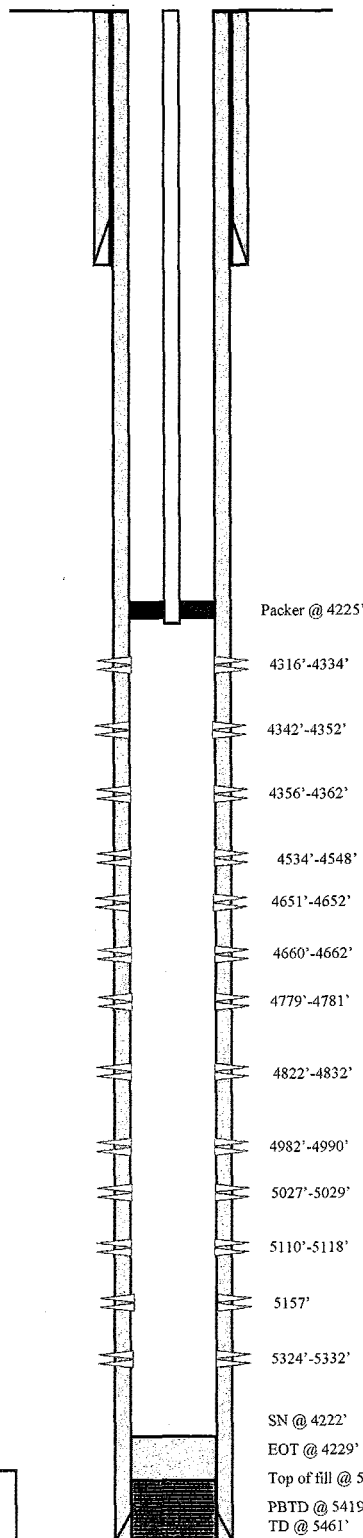
CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 14# & 15.5#  
LENGTH: 131 jts. (5488') 1013' of 15.5# & 4448' of 14#  
DEPTH LANDED: 5461'  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 685 sxs Class "G" cement  
CEMENT TOP AT: 3,290' per CBL

## TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 129 jts. (4209.33')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 4222.43' KB  
TUBING PACKER: 4225.63'  
TOTAL STRING LENGTH: EOT @ 4229.75'

Initial Production: 75 BOPD,  
0 MCFD, 20 BWPD

## Injection Wellbore Diagram



## FRAC JOB

9/29/81	4651'-5328'	Frac A,B,C,D sands as follows: 35,000# 20/40 sand + 11,500 # 10/20 sand in 440 bbls gelled diesel. Treated @ avg press of 4300 psi w/avg rate of 21 BPM. ISIP 2450. Flush to top perms.
10/6/81	4534'-4544'	Frac PB-10 sand as follows: 29,000# 20/40 sand in 286 bbls gelled diesel. Treated @ avg press of 3200 psi w/avg rate of 12 BPM. ISIP 2600.
2/02/85	4317'-4350'	Frac zone as follows: 118,000# 20/40 sand in 785 bbls gelled frac fluid.
12/14/01		Convert to injector.
11/21/06		5 Year MIT completed on 11/15/06 and submitted on 11/21/06.

## PERFORATION RECORD

9/29/81	5328, 5326, 5157, 5116, 5114, 5113, 5029, 5027, 4988, 4987, 4986, 4826, 4825, 4824, 4781, 4779, 4662, 4661, 4660, 4652, 4651' 1 SPF	20 holes
10/4/81	4534'-4544'	2 SPF 24 holes
2/21/85	4342'-4350'	05 holes
2/21/85	4317'-4334'	10 holes
12/13/01	5324'-5332'	4 SPF 32 holes
12/13/01	5110'-5118'	4 SPF 32 holes
12/13/01	4982'-4990'	4 SPF 48 holes
12/13/01	4822'-4832'	4 SPF 40 holes
12/13/01	4534'-4548'	4 SPF 56 holes
12/13/01	4356'-4362'	4 SPF 36 holes
12/13/01	4342'-4352'	4 SPF 40 holes
12/13/01	4316'-4334'	4 SPF 32 holes

**NEWFIELD**

Monument Butte St. #1-2-9-16  
1605' FNL & 1908' FEL  
SWNE Section 2-T9S-R16E  
Duchesne Co, Utah  
API #43-013-30596; Lease #U-21839



# Monument Butte St. #8-2-9-16

Spud Date: 10/06/95  
Put on Production: 12/02/95  
GL: 5447' KB: 5461'

Initial Production: 149 BOPD,  
105 MCFD, 2 BWPD

## Wellbore Diagram

### SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
DEPTH LANDED: 302'  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 120 sxs Class "G" cement.

### PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 15.5#  
DEPTH LANDED: 5891'  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 225 sxs Hifill & 210 sxs premium Plus.  
CEMENT TOP AT: ? per CBL

### TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 165 jts (5265.86')  
TUBING ANCHOR: 5278.86' KB  
NO. OF JOINTS: 2 jts (62.34')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 5344' KB  
NO. OF JOINTS: 1 jts (31.75')  
TOTAL STRING LENGTH: EOT @ 5377.30' W/13'KB

### SUCKER RODS

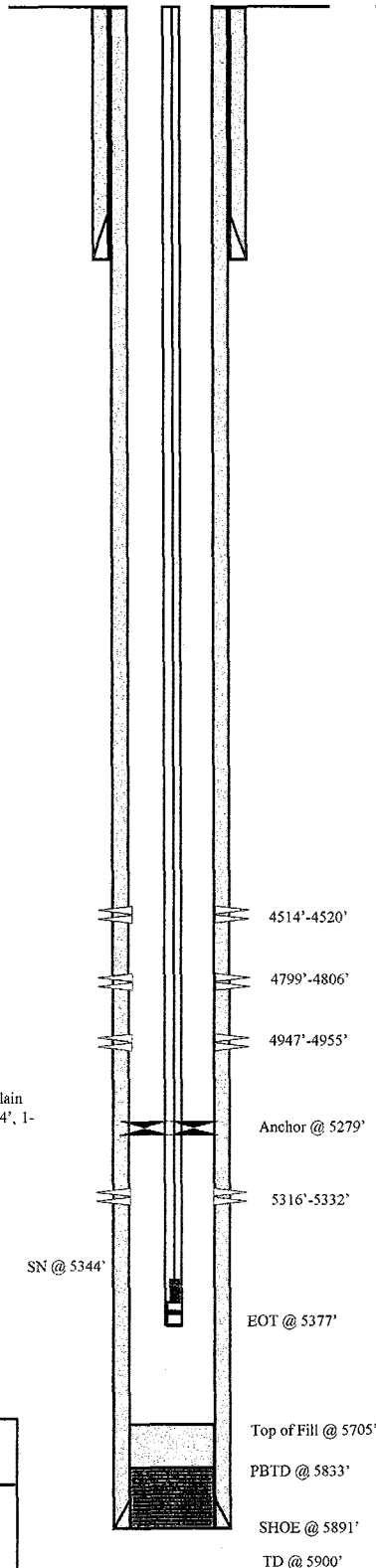
POLISHED ROD: 1-1/2" x 22' SM  
SUCKER RODS: 6-1 1/2" weight bars; 10-3/4" scraped rods; 82-3/4" plain rods; 8-3/4" scraped rods, 14-3/4" plain rods, 92-3/4" scraped rods, 1-4', 1-8' x 3/4" pony rods.  
PUMP SIZE: 2-1/2" x 1-1/2" x 15' RHAC  
STROKE LENGTH: 72"  
PUMP SPEED, SPM: 4.5 SPM  
LOGS: DIGL/SP/GR/CAL

### FRAC JOB

11/22/95 5316'-5332' Frac A3 sand as follows:  
70,700# 20/40 sand in 537 bbls Boragel.  
Treated @ avg press of 2400 psi w/avg rate of 31.5 BPM. ISIP 2280 psi. Calc. flush: 5316 gal. Actual flush: 5233 gal.  
11/25/95 4947'-4955' Frac C-sd sand as follows:  
47,000# 20/40 sand in 443 bbls Boragel.  
Treated @ avg press of 2200 psi w/avg rate of 27 BPM. ISIP 2130 psi. Calc. flush: 4947 gal. Actual flush: 4858 gal.  
11/28/95 4799'-4806' Frac D1 sand as follows:  
48,200# 16/30 sand in 446 bbls Boragel.  
Treated @ avg press of 2200 psi w/avg rate of 25 BPM. ISIP 2255 psi. Calc. flush: 4799 gal. Actual flush: 4748 gal.  
11/01/99 Tubing leak. Update rod and tubing details.  
7/09/02 4514'-4520' Frac PB10 sand as follows:  
36,336# 20/40 sand in 347 bbls Viking I-25 fluid. Treated @ avg press of 2225 psi w/avg rate of 25.5 BPM. ISIP 2340 psi. Calc. flush: 4514 gal. Actual flush: 4410 gal.  
8/5/03 Pump Change. Update tubing and rod details.

### PERFORATION RECORD

11/22/95 5316'-5332' 4 JSPF 64 holes  
11/25/95 4947'-4955' 4 JSPF 32 holes  
11/28/95 4799'-4806' 4 JSPF 28 holes  
7/09/02 4514'-4520' 4 JSPF 24 holes



Inland Resources Inc.

Monument Butte St. #8-2-9-16

2078' FNL & 463' FEL

SENE Section 2-T9S-R16E

Duchesne Co, Utah

API #43-013-31509; Lease #ML-21839



Handwritten: A Hum. E-9

# Monument Butte 6-2-9-16

Spud Date: 10/16/2002  
Put on Production: 01/28/2003  
GL: 5495' KB: 5507'

## Wellbore Diagram

Initial Production: BOPD,  
MCFD, BWPD

### SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
LENGTH: 7 jts. (301.37')  
DEPTH LANDED: 309.37' KB  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 160 sxs Class "G" cmt mixed, est 2 bbls cmt to surf.

Casing Shoe @ 309'

### PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 15.5#  
LENGTH: 135 jts. (6056.07')  
DEPTH LANDED: 6054.07' KB  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 325 sxs Prem. Lite II mixed & 400 sxs 50/50 POZ.  
CEMENT TOP AT: 680'

Cement top @ 680'

### TUBING

SIZE/GRADE/WT.: 2-7/8" / J-55 / 6.5#  
NO. OF JOINTS: 183 jts (5749.95')  
TUBING ANCHOR: 5761.95' KB  
NO. OF JOINTS: 1 jt (31.34')  
SEATING NIPPLE: 2-7/8" (1.10')  
SN LANDED AT: 5796.20' KB  
NO. OF JOINTS: 2 jts (62.85')  
TOTAL STRING LENGTH: EOT @ 5860.60' w/ 12' KB

### SUCKER RODS

POLISHED ROD: 1-1/2" x 22' SM  
SUCKER RODS: 6 1-1/2" weight bars; 20-3/4" scraped rods; 105-3/4" plain rods; 100-3/4" scraped rods; 1-4", 1-2' x 3/4" pony rods.  
PUMP SIZE: 2-1/2" x 1-1/2" x 15' RHAC  
STROKE LENGTH: 86"  
PUMP SPEED, SPM: 4.5 SPM

### FRAC JOB

1/20/03 5687'-5804' **Frac CP1 and CP3 sands as follows:**  
100,781# 20/40 sand in 818 bbls YF 125 fluid. Treated @ avg press of 1741psi w/avg rate of 28 BPM. ISIP 1940 psi. Calc flush: 5687 gal. Actual flush: 5636 gal.

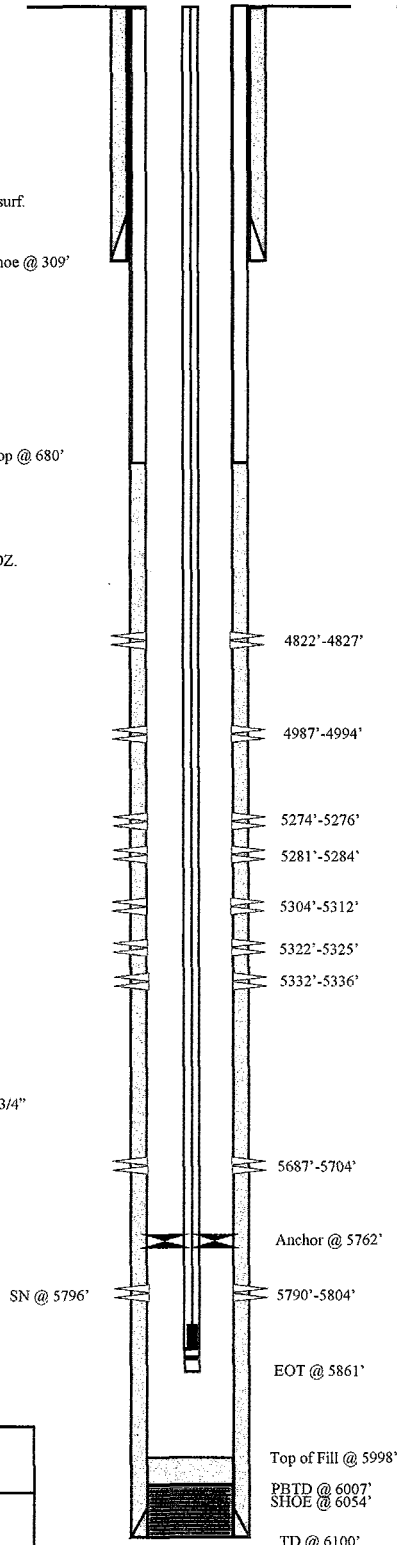
1/20/03 5274'-5336' **Frac A sands as follows:**  
66,689# 20/40 sand in 559 bbls YF 125 fluid. Treated @ avg press of 1955 psi w/avg rate of 27.2 BPM. ISIP 2207 psi. Calc flush: 5274 gal. Actual flush: 5187 gal.

1/20/03 4822'-4994' **Frac C and D1 sands as follows:**  
47,951# 20/40 sand in 433 bbls YF 125 fluid. Treated @ avg press of 2126 psi w/avg rate of 26.5 BPM. ISIP 2027 psi. Calc flush: 4822 gal. Actual flush: 4692 gal.

08/15/06 Pump Change. Update rod and tubing details.

### PERFORATION RECORD

Date	Interval	Tool	Holes
1/18/03	5790'-5804'	4 JSPF	56 holes
1/18/03	5687'-5704'	4 JSPF	68 holes
1/20/03	5332'-5336'	4 JSPF	16 holes
1/20/03	5322'-5325'	4 JSPF	12 holes
1/20/03	5304'-5312'	4 JSPF	32 holes
1/20/03	5281'-5284'	4 JSPF	12 holes
1/20/03	5274'-5276'	4 JSPF	8 holes
1/20/03	4987'-4994'	4 JSPF	28 holes
1/20/03	4822'-4827'	4 JSPF	20 holes



**NEWFIELD**

**Monument Butte 6-2-9-16**  
1960' FWL & 1852' FNL  
SENW Section 2-T9S-R16E  
Duchesne Co, Utah  
API #43-013-32316; Lease #ML-21839



West Coast Region  
5125 Boylan Street  
Bakersfield, CA 93308  
(661) 325-4138  
Lab Team Leader - Sheila Hernandez  
(432) 495-7240

## Water Analysis Report by Baker Petrolite

Company:	NEWFIELD EXPLORATION	Sales RDT:	31706
Region:	WESTERN REGION	Account Manager:	RANDY HUBER (435) 823-0023
Area:	MYTON, UT	Sample #:	43427
Lease/Platform:	MONUMENT BUTTE FEDERAL	Analysis ID #:	79474
Entity (or well #):	2-2-9-16	Analysis Cost:	\$80.00
Formation:	UNKNOWN		
Sample Point:	WELLHEAD		

Summary		Analysis of Sample 43427 @ 75 °F					
<b>Sampling Date:</b>	02/19/08	<b>Anions</b>	mg/l	meq/l	<b>Cations</b>	mg/l	meq/l
<b>Analysis Date:</b>	02/26/08	<b>Chloride:</b>	733.0	20.68	<b>Sodium:</b>	645.2	28.07
<b>Analyst:</b>	LISA HAMILTON	<b>Bicarbonate:</b>	455.0	7.46	<b>Magnesium:</b>	6.5	0.53
<b>TDS (mg/l or g/m3):</b>	1893.3	<b>Carbonate:</b>	32.0	1.07	<b>Calcium:</b>	8.0	0.4
<b>Density (g/cm3, tonne/m3):</b>	1.001	<b>Sulfate:</b>	3.0	0.06	<b>Strontium:</b>	1.5	0.03
<b>Anion/Cation Ratio:</b>	0.9999993	Phosphate:			<b>Barium:</b>	1.5	0.02
Carbon Dioxide:		Borate:			<b>Iron:</b>	0.9	0.03
Oxygen:		Silicate:			Potassium:	6.5	0.17
Comments:		Hydrogen Sulfide:			Aluminum:		
		pH at time of sampling:			Chromium:		
		pH at time of analysis:		8.29	Copper:		
		<b>pH used in Calculation:</b>		<b>8.29</b>	Lead:		
					Manganese:	0.200	0.01
					Nickel:		

Conditions		Values Calculated at the Given Conditions - Amounts of Scale in lb/1000 bbl										
Temp	Gauge Press.	Calcite CaCO <sub>3</sub>		Gypsum CaSO <sub>4</sub> *2H <sub>2</sub> O		Anhydrite CaSO <sub>4</sub>		Celestite SrSO <sub>4</sub>		Barite BaSO <sub>4</sub>		CO <sub>2</sub> Press
°F	psi	Index	Amount	Index	Amount	Index	Amount	Index	Amount	Index	Amount	psi
80	0	0.23	1.75	-4.22	0.00	-4.29	0.00	-3.20	0.00	-0.11	0.00	0.04
100	0	0.29	2.45	-4.22	0.00	-4.22	0.00	-3.17	0.00	-0.25	0.00	0.06
120	0	0.35	2.80	-4.21	0.00	-4.13	0.00	-3.14	0.00	-0.36	0.00	0.08
140	0	0.42	3.50	-4.19	0.00	-4.02	0.00	-3.09	0.00	-0.44	0.00	0.12

Note 1: When assessing the severity of the scale problem, both the saturation index (SI) and amount of scale must be considered.

Note 2: Precipitation of each scale is considered separately. Total scale will be less than the sum of the amounts of the five scales.

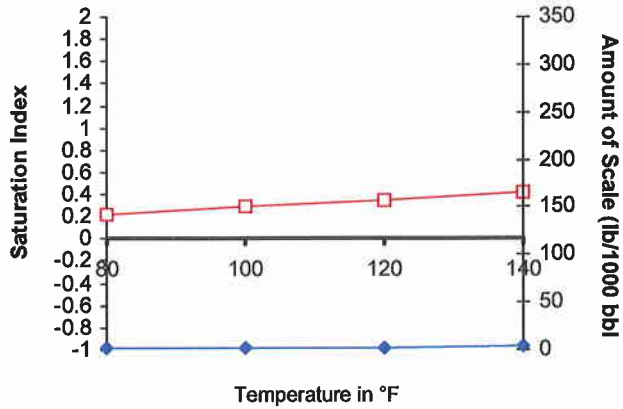
Note 3: The reported CO2 pressure is actually the calculated CO2 fugacity. It is usually nearly the same as the CO2 partial pressure.



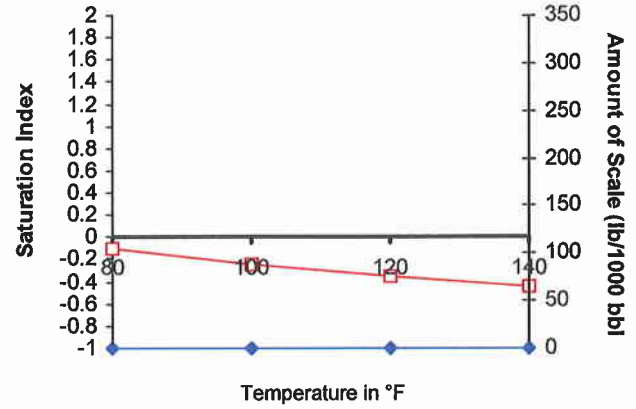
## Scale Predictions from Baker Petrolite

Analysis of Sample 43427 @ 75 °F for NEWFIELD EXPLORATION, 02/26/08

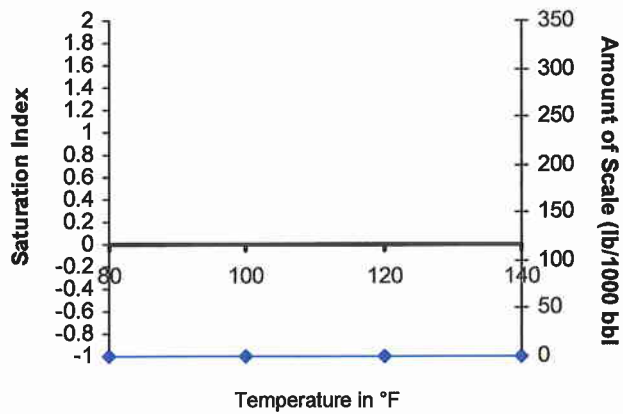
**Calcite -  $\text{CaCO}_3$**



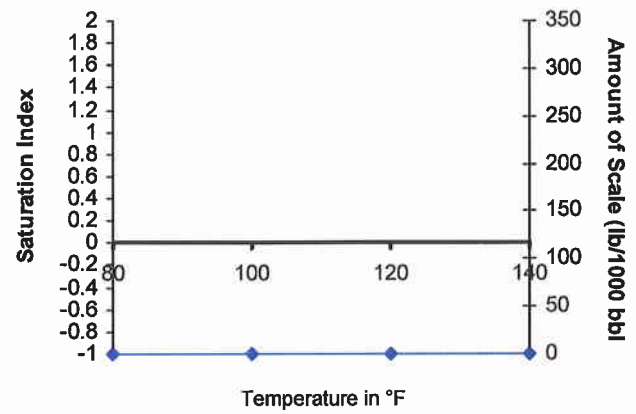
**Barite -  $\text{BaSO}_4$**



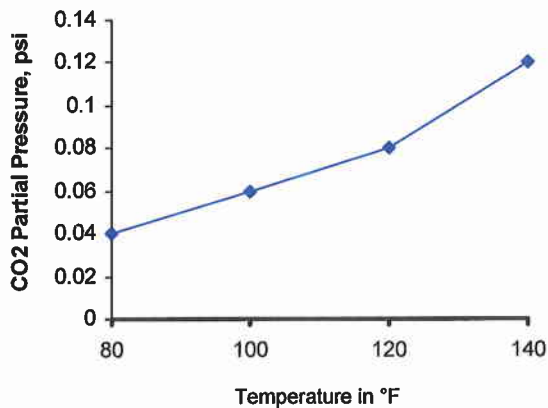
**Gypsum -  $\text{CaSO}_4 \cdot 2\text{H}_2\text{O}$**



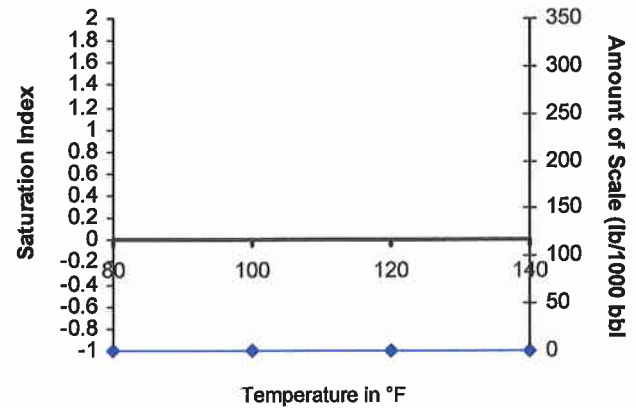
**Anhydrite -  $\text{CaSO}_4$**



**Carbon Dioxide Partial Pressure**



**Celestite -  $\text{SrSO}_4$**





Attachment F 3 of 4

West Coast Region  
5125 Boylan Street  
Bakersfield, CA 93308  
(661) 325-4138  
Lab Team Leader - Sheila Hernandez  
(432) 495-7240

## Water Analysis Report by Baker Petrolite

Company:	NEWFIELD EXPLORATION	Sales RDT:	31706
Region:	WESTERN REGION	Account Manager:	RANDY HUBER (435) 823-0023
Area:	MYTON, UT	Sample #:	409372
Lease/Platform:	MONUMENT BUTTE FEDERAL	Analysis ID #:	78567
Entity (or well #):	INJECTION SYSTEM	Analysis Cost:	\$80.00
Formation:	UNKNOWN		
Sample Point:	TRIPLEX SUCTION		

Summary		Analysis of Sample 409372 @ 75 °F					
Sampling Date:	01/21/08	Anions	mg/l	meq/l	Cations	mg/l	meq/l
Analysis Date:	01/25/08	Chloride:	1529.0	43.13	Sodium:	1199.3	52.17
Analyst:	STACEY SMITH	Bicarbonate:	577.0	9.46	Magnesium:	18.0	1.48
TDS (mg/l or g/m3):	3497	Carbonate:	34.0	1.13	Calcium:	34.0	1.7
Density (g/cm3, tonne/m3):	1.002	Sulfate:	92.0	1.92	Strontium:	2.0	0.05
Anion/Cation Ratio:	1.0000003	Phosphate:			Barium:	5.0	0.07
Carbon Dioxide:		Borate:			Iron:	0.1	0.
Oxygen:		Silicate:			Potassium:	6.5	0.17
Comments:		Hydrogen Sulfide:			Aluminum:		
		pH at time of sampling:			Chromium:		
		pH at time of analysis:		8.48	Copper:		
		pH used in Calculation:		8.48	Lead:		
					Manganese:	0.050	0.
					Nickel:		

Conditions		Values Calculated at the Given Conditions - Amounts of Scale in lb/1000 bbl										
Temp	Gauge Press.	Calcite CaCO <sub>3</sub>		Gypsum CaSO <sub>4</sub> ·2H <sub>2</sub> O		Anhydrite CaSO <sub>4</sub>		Celestite SrSO <sub>4</sub>		Barite BaSO <sub>4</sub>		CO <sub>2</sub> Press
°F	psi	Index	Amount	Index	Amount	Index	Amount	Index	Amount	Index	Amount	psi
80	0	1.00	17.46	-2.30	0.00	-2.37	0.00	-1.78	0.00	1.71	2.79	0.03
100	0	1.02	18.86	-2.31	0.00	-2.31	0.00	-1.76	0.00	1.57	2.79	0.05
120	0	1.05	20.26	-2.30	0.00	-2.23	0.00	-1.73	0.00	1.46	2.79	0.08
140	0	1.08	21.66	-2.29	0.00	-2.12	0.00	-1.69	0.00	1.37	2.79	0.12

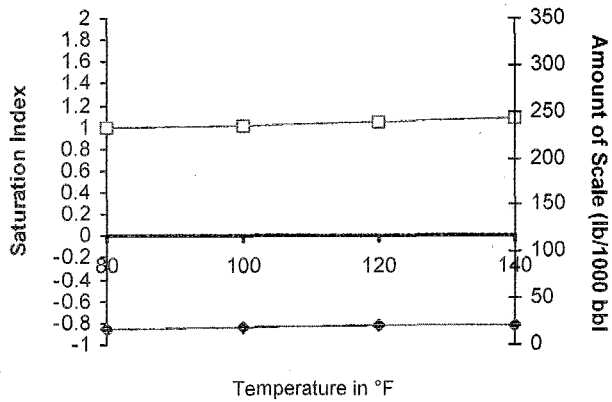
Note 1: When assessing the severity of the scale problem, both the saturation index (SI) and amount of scale must be considered.  
 Note 2: Precipitation of each scale is considered separately. Total scale will be less than the sum of the amounts of the five scales.  
 Note 3: The reported CO2 pressure is actually the calculated CO2 fugacity. It is usually nearly the same as the CO2 partial pressure.



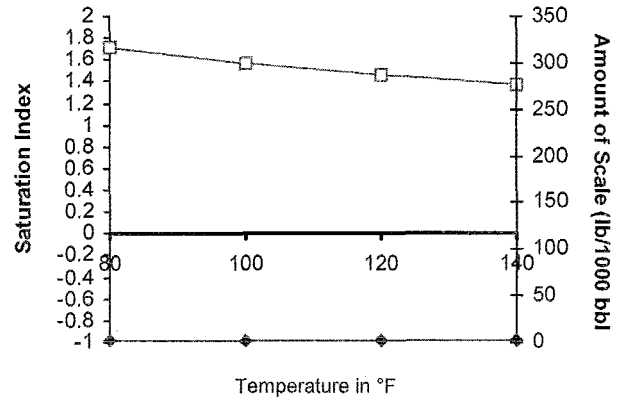
## Scale Predictions from Baker Petrolite

Analysis of Sample 409372 @ 75 °F for NEWFIELD EXPLORATION, 01/25/08

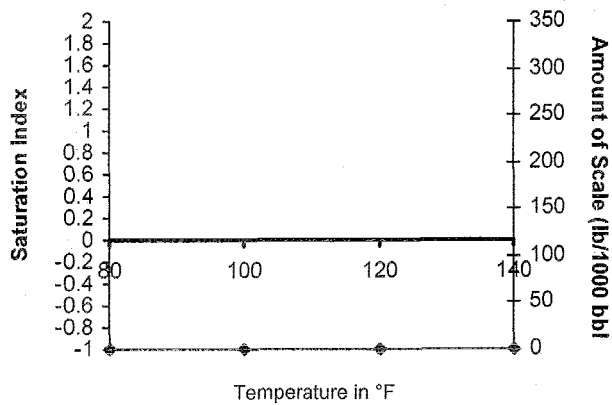
**Calcite -  $\text{CaCO}_3$**



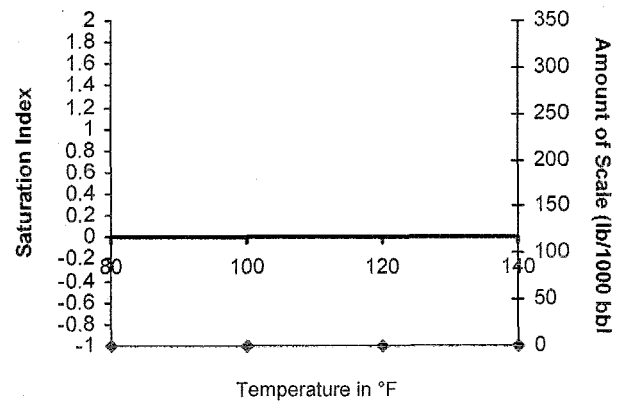
**Barite -  $\text{BaSO}_4$**



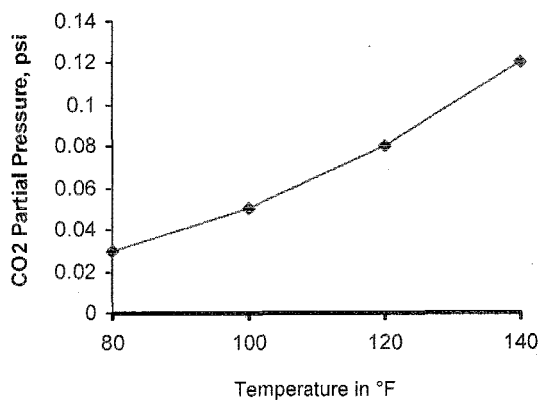
**Gypsum -  $\text{CaSO}_4 \cdot 2\text{H}_2\text{O}$**



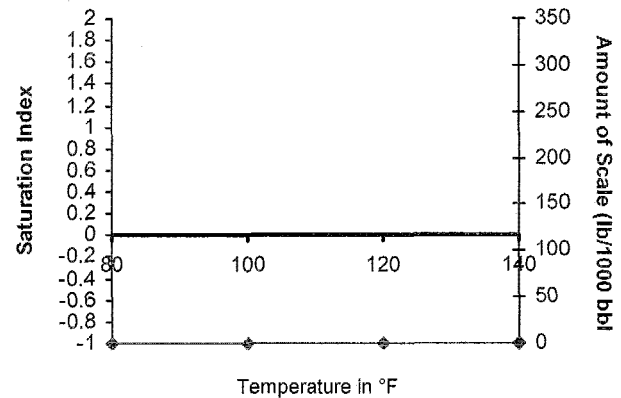
**Anhydrite -  $\text{CaSO}_4$**



**Carbon Dioxide Partial Pressure**



**Celestite -  $\text{SrSO}_4$**





# Attachment "G"

## Monument Butte 2-2-9-16 Proposed Maximum Injection Pressure

Frac Interval (feet)		Avg. Depth (feet)	ISIP (psi)	Calculated Frac Gradient (psi/ft)	Pmax
Top	Bottom				
5322	5380	5351	2230	0.85	2195
4859	5028	4944	2200	0.89	2168
4332	4574	4453	2390	0.98	2362
				Minimum	<u>2168</u>

### Calculation of Maximum Surface Injection Pressure

$$P_{max} = (Frac\ Grad - (0.433 \times 1.015)) \times \text{Depth of Top Perf}$$
 where pressure gradient for the fresh water is .433 psi/ft and  
 specific gravity of the injected water is 1.015.

$$Frac\ Gradient = (ISIP + (0.433 \times \text{Top Perf.})) / \text{Top Perf.}$$

**Please note:** These are existing perforations; additional perforations may be added during the actual conversion procedure.





Attachment 9-1  
1 of 8

### DAILY COMPLETION REPORT

WELL NAME: Monument Butte State 2-2-9-16

Report Date: Jan 16, 2003

Completion Day: 01

Present Operation: Completion

Rig: Rigless

#### WELL STATUS

Surf Csg: 8 5/8 @ 298' Prod Csg: 5 1/2 Wt: 15.5# @ 6108' Csg PBTD: 6052' W.L.  
Tbg: Size: Wt: Grd: Anchor @: BP/Sand PBTD:

#### PERFORATION RECORD

Zone	Perfs	SPF/#shots	Zone	Perfs	SPF/#shots
A1 sds	5322-5337'	2/30			
A3 sds	5377-5380'	4/12			

#### CHRONOLOGICAL OPERATIONS

Date Work Performed: Jan 15, 2003

SITP: 0 SICP: 0

Install 5M frac head. NU 6" 5M cameron BOP. Pressure test casing, blind rams, frac head & casing valves to 3000 psi. RU Schlumberger WLT & run CBL f/ WL TD @ 6052' to sfc. Cement top @ 216'. Perf stage #1 W/ 4" guns as follows: A3 sds @ 5377-80' (4 JSPF) and A1 sds @ 5322-37' (2 JSPF) in 1 gun run total. SIFN W/ 144 BWTR.

#### FLUID RECOVERY (BBLs)

Starting fluid load to be recovered: 144 Starting oil rec to date: 0  
Fluid lost/recovered today: Oil lost/recovered today:  
Ending fluid to be recovered: 144 Cum oil recovered: 0  
IFL: FFL: FTP: Choke: Final Fluid Rate: Final oil cut:

#### STIMULATION DETAIL

Base Fluid used: Job Type:

Company:

Procedure or Equipment detail:

#### COSTS

Weatherford BOP	\$130
IPC NU crew	\$300
IPC trucking	\$800
Schlumberger-CBL-A	\$4,593
Drilling cost	\$187,351
Zubiate HO trk	\$250
Location preparation	\$300
IPC wellhead	\$1,500
Deadman anchors	\$950
Admin. Overhead	\$2,700
IPC supervision	\$400

Max TP: Max Rate: Total fluid pmpd:

Avg TP: Avg Rate: Total Prop pmpd:

ISIP: 5 min: 10 min: FG:

Completion Supervisor: Gary Dietz

DAILY COST: \$199,274

TOTAL WELL COST: \$199,274





Altam 6-1  
2 of 8

### DAILY COMPLETION REPORT

WELL NAME: Monument Butte State 2-2-9-16

Report Date: Jan 17, 2003

Completion Day: 02

Present Operation: Completion

Rig: Rigless

#### WELL STATUS

Surf Csg: 8 5/8 @ 298' Prod Csg: 5 1/2 Wt: 15.5# @ 6108' Csg PBTD: 6052' W.L.  
Tbg: Size: Wt: Grd: Anchor @: BP/Sand PBTD:

#### PERFORATION RECORD

Zone	Perfs	SPF/#shots	Zone	Perfs	SPF/#shots
A1 sds	5322-5337'	2/30			
A3 sds	5377-5380'	4/12			

#### CHRONOLOGICAL OPERATIONS

Date Work Performed: Jan 16, 2003

SITP: 0 SICP: 0

#### Day 2(a):

NU BJ Services "Ram head" flange. RU BJ and frac stage #1 (A sds) W/ 88,884# 20/40 sand in 650 bbls Viking I-25 fluid. Perfs broke down @ 3341 psi. Treated @ ave press of 2243 psi W/ ave rate of 24.5 BPM. ISIP-2230 psi. Leave pressure on well. Est 794 BWTR.

See day 2(b)

#### FLUID RECOVERY (BBLs)

Starting fluid load to be recovered: 144 Starting oil rec to date: 0  
Fluid lost/recovered today: 650 Oil lost/recovered today: 0  
Ending fluid to be recovered: 794 Cum oil recovered: 0  
IFL: 0 FFL: 0 FTP: 0 Choke: 0 Final Fluid Rate: 0 Final oil cut: 0

#### STIMULATION DETAIL

Base Fluid used: Viking I-25 Job Type: Sand frac

Company: BJ Services

Procedure or Equipment detail: A1 and A3 sands

6700 gals of pad

4625 gals W/ 1-5 ppg of 20/40 sand

9250 gals W/ 5-8 ppg of 20/40 sand

1455 gals W/ 8 ppg of 20/40 sand

Flush W/ 5250 gals of slick water

#### COSTS

Weatherford BOP \$130

BJ Services-A sds \$22,733

Betts frac wtr \$990

IPC fuel gas \$60

IPC supervision \$100

Max TP: 2478 Max Rate: 24.7 BPM Total fluid pmpd: 650 bbls

Avg TP: 2243 Avg Rate: 24.5 BPM Total Prop pmpd: 88,884#

ISIP: 2230 5 min: 0 10 min: 0 FG: .85

Completion Supervisor: Gary Dietz

DAILY COST: \$24,013

TOTAL WELL COST: \$223,287





A Ham. 6-1

3 of 8

## DAILY COMPLETION REPORT

WELL NAME: Monument Butte State 2-2-9-16

Report Date: Jan 17, 2003

Completion Day: 02

Present Operation: Completion

Rig: Rigless

## WELL STATUS

Surf Csg: 8 5/8 @ 298' Prod Csg: 5 1/2 Wt: 15.5# @ 6108' Csg PBTD: 6052' W.L.  
Tbg: Size: Wt: Grd: Anchor @: BP/Sand PBTD: 5080'

## PERFORATION RECORD

Zone	Perfs	SPF/#shots	Zone	Perfs	SPF/#shots
D1 sds	4859-4864'	4/20			
D1 sds	4867-4870'	4/12			
C sds	5020-5028'	4/32			
A1 sds	5322-5337'	2/30			
A3 sds	5377-5380'	4/12			

## CHRONOLOGICAL OPERATIONS

Date Work Performed: Jan 16, 2003

SITP: SICP: 2230

## Day 2(b):

RU Schlumberger WLT, crane & lubricator. Run Weatherford 5 1/2" composite flowthrough frac plug & 4" perf gun. Set plug @ 5080'. Perf stage #2 W/ 4" guns as follows: C sds @ 5020-28' and D1 sds @ 4859-64' & 4867-70'. All 4 JSPF W/ 2 runs total. RU BJ and frac D/C sds W/ 68,788# 20/40 sand in 540 bbls Viking I-25 fluid. Perfs broke down @ 2630 psi. Saw second definitive breakdown @ 3288 psi 26 bbls into job. Treated @ ave press of 2134 psi W/ ave rate of 26.4 BPM. ISIP-2200 psi. Leave pressure on well. Est 1334 BWTR.

## See day 2(c)

## FLUID RECOVERY (BBLs)

Starting fluid load to be recovered: 794 Starting oil rec to date: 0  
Fluid lost/recovered today: 540 Oil lost/recovered today:  
Ending fluid to be recovered: 1334 Cum oil recovered: 0  
IFL: FFL: FTP: Choke: Final Fluid Rate: Final oil cut:

## STIMULATION DETAIL

## COSTS

Base Fluid used: Viking I-25 Job Type: Sand frac

Company: BJ Services

Procedure or Equipment detail: D1 and C sands

5400 gals of pad

3750 gals W/ 1-5 ppg of 20/40 sand

7500 gals W/ 5-8 ppg of 20/40 sand

1245 gals W/ 8 ppg of 20/40 sand

Flush W/ 4767 gals of slick water

Weatherford frac plug \$2,775

BJ Services-D/C sds \$13,060

Betts frac wtr \$900

IPC fuel gas \$60

Weatherford service \$550

Schlumberger-D/C sds \$3,440

IPC supervision \$100

Max TP: 3036 Max Rate: 26.5 BPM Total fluid pmpd: 540 bbls

Avg TP: 2134 Avg Rate: 26.4 BPM Total Prop pmpd: 68,788#

ISIP: 2200 5 min: 10 min: FG: .88

Completion Supervisor: Gary Dietz

DAILY COST: \$20,885

TOTAL WELL COST: \$244,172





Aham 4-1

4 of 8

## DAILY COMPLETION REPORT

WELL NAME: Monument Butte State 2-2-9-16

Report Date: Jan 17, 2003

Completion Day: 02

Present Operation: Completion

Rig: Rigless

## WELL STATUS

Surf Csg: 8 5/8 @ 298' Prod Csg: 5 1/2 Wt: 15.5# @ 6108' Csg PBTD: 6052' W.L.  
Tbg: Size: Wt: Grd: Anchor @: BP/Sand PBTD: 5080'  
BP/Sand PBTD: 4630'

## PERFORATION RECORD

Zone	Perfs	SPF/#shots	Zone	Perfs	SPF/#shots
GB4 sds	4332-4338'	4/24	D1 sds	4859-4864'	4/20
GB4 sds	4349-4351'	4/8	D1 sds	4867-4870'	4/12
GB6 sds	4369-4372'	4/12	C sds	5020-5028'	4/32
GB6 sds	4393-4397'	4/16	A1 sds	5322-5337'	2/30
PB10 sds	4559-4566'	4/28	A3 sds	5377-5380'	4/12
PB10 sds	4570-4574'	4/16			

## CHRONOLOGICAL OPERATIONS

Date Work Performed: Jan 16, 2003

SITP: SICIP: 2200

## Day 2(c):

RU Schlumberger & run Weatherford 5 1/2" composite flowthrough frac plug & 4" perf guns. Set plug @ 4630'. Perf stage #3 W/ 4" guns as follows: PB10 sds @ 4559-66' & 4570-74'; GB6 sds @ 4369-72' & 4393-97' and GB4 sds @ 4332-38' & 4349-51'. All 4 JSPF in 3 runs total (W/ 1 misrun). RU BJ and frac GB/PB sds W/ 65,544# 20/40 sand in 519 bbls Viking I-25 fluid. Perfs broke down @ 2107 psi. Treated @ ave press of 2094 psi W/ ave rate of 24.6 BPM. ISIP-2390 psi. RD BJ & WLT. Begin immediate flowback of GB/PB, D/C and A sd fracs (combined frac load of 1709 bbls) on 12/64 choke @ 1 BPM. Flowed well 9 1/2 hrs & started showing oil. Flowed 3 hrs on 20/64 choke (.7 BPM) W/ 200 psi and recovering increasing oil cut (approx. 20% @ end). Rec 606 BTF (est 35% of frac loads). SWI for night W/ est 1247 BWTR.

## FLUID RECOVERY (BBLs)

Starting fluid load to be recovered: 1334 Starting oil rec to date: 0  
Fluid lost/recovered today: 87 Oil lost/recovered today:  
Ending fluid to be recovered: 1247 Cum oil recovered: 0  
IFL: FFL: FTP: Choke: 12/64 Final Fluid Rate: Final oil cut:

## STIMULATION DETAIL

Base Fluid used: Viking I-25 Job Type: Sand frac  
Company: BJ Services

Procedure or Equipment detail: GB4, GB6 and PB10 sands

5400 gals of pad  
3750 gals W/ 1-5 ppg of 20/40 sand  
7500 gals W/ 5-8 ppg of 20/40 sand  
882 gals W/ 8 ppg of 20/40 sand  
Flush W/ 4242 gals of slick water

## COSTS

Weatherford frac plug	\$2,775
BJ Services-GB/PB	\$13,133
Betts frac wtr	\$1,110
IPC fuel gas	\$60
IPC frac head rental	\$300
Schlumberger-GB/PB	\$4,278
IPC frac tks (5X3 days)	\$600
IPC flowback super	\$420
IPC supervision	\$100

Max TP: 3109 Max Rate: 25.2 BPM Total fluid pmpd: 519 bbls  
Avg TP: 2094 Avg Rate: 25.2 BPM Total Prop pmpd: 65,544#  
ISIP: 2390 5 min: 10 min: FG: .97

Completion Supervisor: Gary Dietz

DAILY COST: \$22,776  
TOTAL WELL COST: \$266,948





ATTACH. 4-1

5 of 8

## DAILY COMPLETION REPORT

WELL NAME: Monument Butte State 2-2-9-16

Report Date: Jan. 18, 2003

Completion Day: 03

Present Operation: Completion

Rig: Basin #1

## WELL STATUS

Surf Csg: 8 5/8 @ 298' Prod Csg: 5 1/2 Wt: 15.5# @ 6108' Csg PBTD: 6052' W.L.  
Tbg: Size: 2 7/8 Wt: 6.5# Grd: J-55 (B) Pkr/EOT @: 4606' BP/Sand PBTD: 5080'  
BP/Sand PBTD: 4630'

## PERFORATION RECORD

Zone	Perfs	SPF/#shots	Zone	Perfs	SPF/#shots
GB4 sds	4332-4338'	4/24	D1 sds	4859-4864'	4/20
GB4 sds	4349-4351'	4/8	D1 sds	4867-4870'	4/12
GB6 sds	4369-4372'	4/12	C sds	5020-5028'	4/32
GB6 sds	4393-4397'	4/16	A1 sds	5322-5337'	2/30
PB10 sds	4559-4566'	4/28	A3 sds	5377-5380'	4/12
PB10 sds	4570-4574'	4/16			

## CHRONOLOGICAL OPERATIONS

Date Work Performed: Jan. 17, 2003

SITP: SICP: 700

SICP 700 psi after 3 hrs. Tie casing into flowline. Bleed well down to production tks while MIRU Basin #1. NU washington stripping head. RU HO trk & thaw out BOP. Bullhead 50 BW dn csg @ 160°F. Install rubber in stripping head. Talley, drift, PU & TIH W/ new Smith 4 3/4" tooth bit, bit sub & 2 7/8 8rd 6.5# used/ inspected blue & yellow band tbg. Ran cast iron tbg disk 1 jt above bit. Filled tbg W/ wtr (26 bbls) as RIH. Well flowed back 50 BW to flat tank, then switched flow to prod tks. Rec 205 BTF (est 164 BO & 41 BW) while TIH W/ tbg. Tagged composite plug @ 4630'. Pull EOT to 4606'. RU power swivel. Leave tbg shut in & left casing flow to production tks overnight. Est 1232 BWTR.

## FLUID RECOVERY (BBLs)

Starting fluid load to be recovered: 1247 Starting oil rec to date: 0  
Fluid lost/recovered today: 15 Oil lost/recovered today: 164  
Ending fluid to be recovered: 1232 Cum oil recovered: 164  
IFL: FFL: FTP: Choke: Final Fluid Rate: Final oil cut: 80%

## STIMULATION DETAIL

Base Fluid used: Job Type:

Company:

Procedure or Equipment detail:

## COSTS

Basin rig	\$2,250
Weatherford BOP	\$130
Zubiate HO trk	\$475
IPC trucking	\$700
IPC inspected tbg	\$14,740
RNI wtr truck	\$500
Weatherford bit	\$850
IPC supervision	\$300

Max TP: Max Rate: Total fluid pmpd:

Avg TP: Avg Rate: Total Prop pmpd:

ISIP: 5 min: 10 min: FG:

Completion Supervisor: Gary Dietz

DAILY COST: \$19,945

TOTAL WELL COST: \$286,893





AHach 4-1  
b of 8

### DAILY COMPLETION REPORT

WELL NAME: Monument Butte State 2-2-9-16

Report Date: Jan. 19, 2003

Completion Day: 04

Present Operation: Completion

Rig: Basin #1

#### WELL STATUS

Surf Csg: 8 5/8 @ 298' Prod Csg: 5 1/2 Wt: 15.5# @ 6108' Csg PBTD: 6062'  
Tbg: Size: 2 7/8 Wt: 6.5# Grd: J-55 (B) Pkr/EOT @: 5425' BP/Sand PBTD: 6062'

#### PERFORATION RECORD

Zone	Perfs	SPF/#shots	Zone	Perfs	SPF/#shots
GB4 sds	4332-4338'	4/24	D1 sds	4859-4864'	4/20
GB4 sds	4349-4351'	4/8	D1 sds	4867-4870'	4/12
GB6 sds	4369-4372'	4/12	C sds	5020-5028'	4/32
GB6 sds	4393-4397'	4/16	A1 sds	5322-5337'	2/30
PB10 sds	4559-4566'	4/28	A3 sds	5377-5380'	4/12
PB10 sds	4570-4574'	4/16			

#### CHRONOLOGICAL OPERATIONS

Date Work Performed: Jan. 18, 2003

SITP: 200 SICP:

Well flowed 152 BTF last 12 hrs (est 121 BO & 31 BW). RU HO trk to tbg. Start pumping wtr @ 160°F (disk ruptured @ 200 psi). Pump 95 bbls before seeing pressure increase. Took 140 bbls to get mostly clean returns f/ casing. Recovered 108 BTF (est 86 BO & 22 BW) to production tks. Make connection & drill composite plug @ 4630' in 30 minutes. Continue swiveling in hole to plug @ 5080'. Drill plug in 30 minutes. RD swivel. PU & TIH W/ 16 jts tbg. Tag fill @ 5635'. RU swivel. Drill plug remains & sand to PBTD @ 6062'. Circ hole clean. Lost 159 BW during drilling (returns contained light oil & gas throughout drilling operations). RD & rack out swivel. LD 20 jts tbg (EOT @ 5425'). SIFN W/ est 1478 BWTR.

#### FLUID RECOVERY (BBLs)

Starting fluid load to be recovered: <u>1232</u>	Starting oil rec to date: <u>164</u>
Fluid lost/recovered today: <u>246</u>	Oil lost/recovered today: <u>207</u>
Ending fluid to be recovered: <u>1478</u>	Cum oil recovered: <u>371</u>
IFL: <u></u> FFL: <u></u> FTP: <u></u> Choke: <u></u>	Final Fluid Rate: <u></u> Final oil cut: <u>80%</u>

#### STIMULATION DETAIL

Base Fluid used:  Job Type:

Company:

Procedure or Equipment detail:

#### COSTS

Basin rig	\$2,710
Weatherford BOP	\$130
Zubiate HO trk	\$414
Four star swivel & trk	\$550
RNI wtr & truck	\$600
Contract labor/welding	\$3,850
Sfc equipment	\$70,000
Randys rod pump	\$1,000
Randys TA	\$350
Randys SN	\$70
IPC supervision	\$300

Max TP:  Max Rate:  Total fluid pmpd:   
Avg TP:  Avg Rate:  Total Prop pmpd:   
ISIP:  5 min:  10 min:  FG:

Completion Supervisor: Gary Dietz

DAILY COST: \$79,974  
TOTAL WELL COST: \$366,867





A Hqn 4-1,  
7 of 8

### DAILY COMPLETION REPORT

WELL NAME: Monument Butte State 2-2-9-16

Report Date: Jan. 21, 2003

Completion Day: 05

Present Operation: Completion

Rig: Basin #1

#### WELL STATUS

Surf Csg: 8 5/8 @ 298' Prod Csg: 5 1/2 Wt: 15.5# @ 6108' Csg PBTD: 6062'  
Tbg: Size: 2 7/8 Wt: 6.5# Grd: J-55 (B) Anchor @: 5275' BP/Sand PBTD: 6062'

#### PERFORATION RECORD

Zone	Perfs	SPF/#shots	Zone	Perfs	SPF/#shots
GB4 sds	4332-4338'	4/24	D1 sds	4859-4864'	4/20
GB4 sds	4349-4351'	4/8	D1 sds	4867-4870'	4/12
GB6 sds	4369-4372'	4/12	C sds	5020-5028'	4/32
GB6 sds	4393-4397'	4/16	A1 sds	5322-5337'	2/30
PB10 sds	4559-4566'	4/28	A3 sds	5377-5380'	4/12
PB10 sds	4570-4574'	4/16			

#### CHRONOLOGICAL OPERATIONS

Date Work Performed: Jan. 20, 2003

SITP: 500 SICP: 500

Bleed casing off to production tks (gas, then flowing oil). RU HO trk & pump 150 BW dn tbg @ 190°F. Returned 140 BTF (est 56 BO & 84 BW). Well stays flowing slightly. TOH W/ tbg--LD bit. TIH W/ BHA & production tbg as follows: 2 7/8 NC, 2 jts tbg, SN, 3 jts tbg, repaired Randys' 5 1/2" TA (45K) & 169 jts 2 7/8 8rd 6.5# J-55 (B grade) tbg. Well flowing stronger at this time. RU HO trk & circ well W/ 120 BW - flowing small amount. ND BOP. Strip off 5M frac head & strip on 3M production tbg head. Set TA @ 5275' W/ SN @ 5369' & EOT @ 5434'. Land tbg W/ 16,000# tension. NU wellhead. PU & TIH W/ pump & rod string to 3775'. SIFN. Estimating 20 BW loss total for day and recovered 106 BO. Have adjusted fluid recovery numbers after wtr drain. Est 1353 BWTR.

#### FLUID RECOVERY (BBLs)

Starting fluid load to be recovered: 1333 (adj) Starting oil rec to date: 226 (adj)  
Fluid lost/recovered today: 20 Oil lost/recovered today: 106  
Ending fluid to be recovered: 1353 Cum oil recovered: 332  
IFL: \_\_\_\_\_ FFL: \_\_\_\_\_ FTP: \_\_\_\_\_ Choke: \_\_\_\_\_ Final Fluid Rate: \_\_\_\_\_ Final oil cut: 40%

#### COSTS

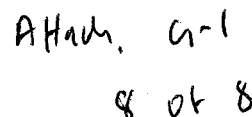
TUBING DETAIL	ROD DETAIL		
		Basin rig	\$2,915
		Weatherford BOP	\$130
KB 12.00'		Zubiate HO trk	\$1,379
169 2 7/8 J-55 tbg (5262.75')		RNI wtr & truck	\$500
TA (2.80' @ 5274.75' KB)		IPC supervision	\$300
3 2 7/8 J-55 tbg (91.68')			
SN (1.10' @ 5369.23' KB)			
2 2 7/8 J-55 tbg (63.06')			
2 7/8 NC (.45')			
EOT 5433.84' W/ 12' KB			

DAILY COST: \$5,224

Workover Supervisor: Gary Dietz

TOTAL WELL COST: \$372,091





**Completion Day: 06**

Rig: Basin #1

Surf Csg:	8 5/8	@	298'	Prod Csg:	5 1/2	Wt:	15.5#	@	6108'	Csg PBTD:	6062'
Tbg:	Size:	2 7/8	Wt:	6.5#	Grd:	J-55 (B)	Anchor @:	5275'	BP/Sand PBTD:	6062'	

<u>Zone</u>	<u>Perfs</u>	<u>SPF/#shots</u>	<u>Zone</u>	<u>Perfs</u>	<u>SPF/#shots</u>
GB4 sds	4332-4338'	4/24	D1 sds	4859-4864'	4/20
GB4 sds	4349-4351'	4/8	D1 sds	4867-4870'	4/12
GB6 sds	4369-4372'	4/12	C sds	5020-5028'	4/32
GB6 sds	4393-4397'	4/16	A1 sds	5322-5337'	2/30
PB10 sds	4559-4566'	4/28	A3 sds	5377-5380'	4/12
PB10 sds	4570-4574'	4/16			

Date Work Performed: 1-21-03 SITP: 250 SICP: 325

### Final report.

Starting fluid load to be recovered:	1353	Starting oil rec to date:	226 (adj)
Fluid <u>lost</u> /recovered today:	41	Oil <u>lost</u> /recovered today:	106
Ending fluid to be recovered:	1394	Cum oil recovered:	332
IFL:	FFL:	FTP:	
		Choke:	Final Fluid Rate:
		Final oil cut: 40%	

TUBING DETAIL		ROD DETAIL		BASIN RIG DETAIL	
				Basin rig	\$1,300
				Weatherford BOP	\$200
KB	12.00'	1 1/2"x 22' polished rod		Zubiate HO trk	\$400
169	2 7/8 J-55 tbg (5262.75')	1-4', 1-2"x 3/4" pony rods		IPC supervision	\$300
	TA (2.80' @ 5274.75' KB)	99- 3/4" guided rods			
3	2 7/8 J-55 tbg (91.68')	98- 3/4" plain rods			
	SN (1.10' @ 5369.23' KB)	10- 3/4" guided rods			
2	2 7/8 J-55 tbg (63.06')	6- 1 1/2" WT bars			
	2 7/8 NC (.45')	2 1/2"x 1 1/2"x 14' RHAC			
EOT	5433.84' W/ 12' KB	Randys pump			

**TOTAL WELL COST:** \$374,291

**Workover Supervisor:** Brent Cook



## **ATTACHMENT H**

### **WORK PROCEDURE FOR PLUGGING AND ABANDONMENT**

1. Set CIBP @ 4237'.
2. Plug #1 Set 100' plug on top of CIBP using 12 sx Class "G" cement.
3. Plug #2 Set 200' plug from 2000'-2200' with 25 sx Class "G" cement.
4. Plug #3 Pump 40 Class G Cement down 5 -1/2" casing to 348.

The approximate cost to plug and abandon this well is \$35,401.



Attachment, H-1

# Monument Butte #2-2-9-16

Spud Date: 08/28/2002  
Put on Production: 01/21/2003  
GL: 5475' KB: 5487'

Initial Production: 79 BOPD,  
311 MCFD, 5 BWPD,

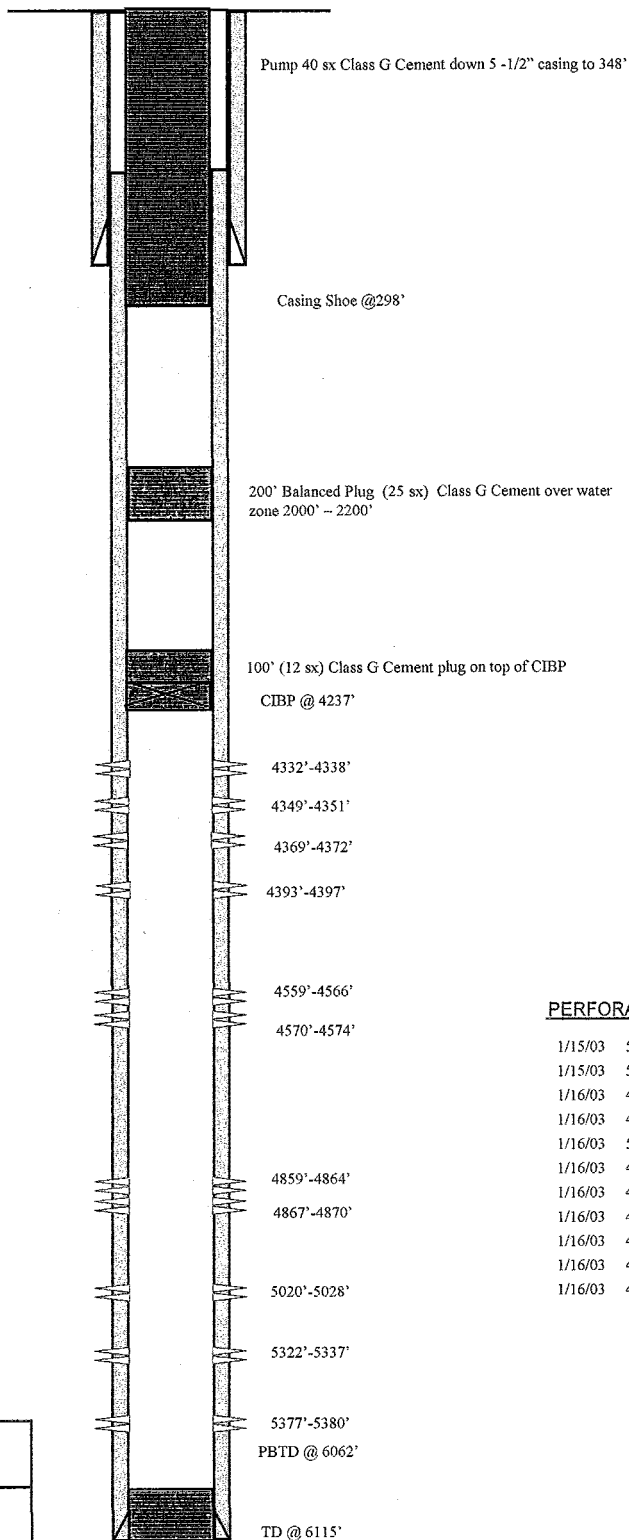
## SURFACE CASING

CSG SIZE: 8-5/8"  
GRADE: J-55  
WEIGHT: 24#  
LENGTH: 7 jts. (290.39')  
DEPTH LANDED: 298.39' KB  
HOLE SIZE: 12-1/4"  
CEMENT DATA: 145 sxs Class "G" cmt, est 4 bbls cmt to surf.

## PRODUCTION CASING

CSG SIZE: 5-1/2"  
GRADE: J-55  
WEIGHT: 15.5#  
LENGTH: 143 jts. (6109.91')  
DEPTH LANDED: 6107.91' KB  
HOLE SIZE: 7-7/8"  
CEMENT DATA: 275 sxs Prem. Lite II mixed & 500 sxs 50/50 POZ.  
CEMENT TOP AT: 216'

## Proposed P & A Wellbore Diagram



## PERFORATION RECORD

1/15/03	5322'-5337'	2 JSPF	30 holes
1/15/03	5377'-5380'	4 JSPF	12 holes
1/16/03	4859'-4864'	4 JSPF	20 holes
1/16/03	4867'-4870'	4 JSPF	12 holes
1/16/03	5020'-5028'	4 JSPF	32 holes
1/16/03	4332'-4338'	4 JSPF	24 holes
1/16/03	4349'-4351'	4 JSPF	8 holes
1/16/03	4369'-4372'	4 JSPF	12 holes
1/16/03	4393'-4397'	4 JSPF	16 holes
1/16/03	4559'-4566'	4 JSPF	28 holes
1/16/03	4570'-4574'	4 JSPF	16 holes

**NEWFIELD**

**Monument Butte**

660' FNL & 1980' FEL  
NWNE Section 02-T9S-R16E  
Duchesne Co, Utah  
API #43-013-32314; Lease #ML-21839



STATE OF UTAH  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.

1. TYPE OF WELL: OIL WELL <input checked="" type="checkbox"/> GAS WELL <input type="checkbox"/> OTHER <input type="checkbox"/>		5. LEASE DESIGNATION AND SERIAL NUMBER: UTAH STATE ML-21839
2. NAME OF OPERATOR: NEWFIELD PRODUCTION COMPANY		6. IF INDIAN, ALLOTTEE OR TRIBE NAME:
3. ADDRESS OF OPERATOR: Route 3 Box 3630 CITY Myton STATE UT ZIP 84052		7. UNIT or CA AGREEMENT NAME: MON BUTTE UNIT
PHONE NUMBER 435.646.3721		8. WELL NAME and NUMBER: MONUMENT BUTTE 2-2-9-16
4. LOCATION OF WELL: FOOTAGES AT SURFACE: 660 FNL 1980 FEL		9. API NUMBER: 4301332314
OTR/OTR. SECTION. TOWNSHIP. RANGE. MERIDIAN: NWNE, 2, T9S, R16E		10. FIELD AND POOL, OR WILDCAT: MONUMENT BUTTE
		COUNTY: DUCHESNE
		STATE: UT

CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
<input checked="" type="checkbox"/> NOTICE OF INTENT (Submit in Duplicate)  Approximate date work will 02/08/2008	<input type="checkbox"/> ACIDIZE <input type="checkbox"/> ALTER CASING <input type="checkbox"/> CASING REPAIR <input type="checkbox"/> CHANGE TO PREVIOUS PLANS <input type="checkbox"/> CHANGE TUBING <input type="checkbox"/> CHANGE WELL NAME <input type="checkbox"/> CHANGE WELL STATUS <input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS <input checked="" type="checkbox"/> CONVERT WELL TYPE	<input type="checkbox"/> DEEPEN <input type="checkbox"/> FRACTURE TREAT <input type="checkbox"/> NEW CONSTRUCTION <input type="checkbox"/> OPERATOR CHANGE <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/> PLUG BACK <input type="checkbox"/> PRODUCTION (START/STOP) <input type="checkbox"/> RECLAMATION OF WELL SITE <input type="checkbox"/> RECOMPLETE - DIFFERENT FORMATION	<input type="checkbox"/> REPERFORATE CURRENT FORMATION <input type="checkbox"/> SIDETRACK TO REPAIR WELL <input type="checkbox"/> TEMPORARILY ABANDON <input type="checkbox"/> TUBING REPAIR <input type="checkbox"/> VENT OR FLAIR <input type="checkbox"/> WATER DISPOSAL <input type="checkbox"/> WATER SHUT-OFF <input type="checkbox"/> OTHER: -
<input type="checkbox"/> SUBSEQUENT REPORT (Submit Original Form Only)  Date of Work Completion:			

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.  
Newfield Production proposes to convert the above mentioned well from a producing oil well to an injection well.

NAME (PLEASE PRINT) Eric Sundberg

TITLE Regulatory Analyst

SIGNATURE

DATE

2/27/08

(This space for State use only)



**From:** Bonnie <bonnie@ubstandard.com>  
**To:** <jsweet@utah.gov>  
**Date:** 03/21/2008 3:46 PM  
**Subject:** Legals run dates

Jean,

Legals UIC 066.2, UIC 345, UIC 346 and UIC 344 will all run in our March 25th issue.

Thank you,

Bonnie Parrish  
Uintah Basin Standard  
435-722-5131





JON M. HUNTSMAN, JR.  
Governor

GARY R. HERBERT  
Lieutenant Governor

# State of Utah

## DEPARTMENT OF NATURAL RESOURCES

MICHAEL R. STYLER  
Executive Director

### Division of Oil, Gas and Mining

JOHN R. BAZA  
Division Director

April 21, 2008

Newfield Production Company  
1401 17<sup>th</sup> Street, Suite 1000  
Denver, Colorado 80202

Re: Monument Butte Unit Well: Monument Butte 2-2-9-16, Section 2, Township 9 South, Range 16 East, Duchesne County, Utah

Mr. Eric Sundberg,

Pursuant to Utah Admin. Code R649-5-3-3, the Division of Oil, Gas and Mining (the "Division") issues its administrative approval for conversion of the referenced well to a Class II injection well. Accordingly, the following stipulations shall apply for full compliance with this approval:

1. Compliance with all applicable requirements for the operation, maintenance and reporting for Underground Injection Control ("UIC") Class II injection wells pursuant to Utah Admin. Code R649-1 et seq.
2. Conformance with all conditions and requirements of the complete application submitted by Newfield Production Company.
3. A casing/tubing pressure test shall be conducted prior to commencing injection.

The Division will issue an Underground Injection Control Permit after the above stipulations have been met. If you have any questions regarding this approval or the necessary requirements, please contact Brad Hill or Dan Jarvis at this office.

Sincerely,

Gil Hunt  
Associate Director

cc: Dan Jackson, Environmental Protection Agency  
Bureau of Land Management, Vernal  
Newfield Production Company, Myton  
SITLA  
Duchesne County  
Well File





**DIVISION OF OIL, GAS AND MINING  
UNDERGROUND INJECTION CONTROL PROGRAM  
PERMIT  
STATEMENT OF BASIS**

**Applicant:** Newfield Production Company      **Well:** Monument Butte 2-2-9-16

**Location:** 2/9S/16E      **API:** 43-013-32314

**Ownership Issues:** The proposed well is located on State of Utah land. The well is located in the Monument Butte Unit. Lands in the one-half mile radius of the well are administered by the BLM and State of Utah. The Federal Government and State of Utah are the mineral owners within the area of review. Newfield and other various individuals hold the leases in the unit. Newfield has provided a list of all surface, mineral and lease holders in the half-mile radius. Newfield is the operator of the Monument Butte Unit. Newfield has submitted an affidavit stating that all owners and interest owners have been notified of their intent.

**Well Integrity:** The proposed well has surface casing set at 298 feet and has a cement top at the surface. A 5½ inch production casing is set at 6,108 feet. A cement bond log demonstrates adequate bond in this well up to 3,338 feet. A 2 7/8 inch tubing with a packer will be set at 4,297 feet. A mechanical integrity test will be run on the well prior to injection. There are 9 producing wells, 4 injection wells and 1 shut-in well in the area of review. All of the wells have evidence of adequate casing and cement. No other corrective action will be required.

**Ground Water Protection:** According to Technical Publication No. 92 the base of moderately saline water is approximately 495 feet. Injection shall be the interval between 4,400 feet and 6,098 feet in the Green River Formation. Information submitted by Newfield indicates that the fracture gradient for the 2-2-9-16 well is .89 psi/ft which was the lowest reported fracture gradient for the injection zone. The resulting minimum fracture pressure for the proposed injection interval is 2,168 psig. The requested maximum pressure is 2,168 psig. The anticipated average injection pressure is 1100 psig. Injection at this pressure should not initiate any new fractures or propagate existing fractures in the adjacent confining intervals. Any ground water present should be adequately protected.



**Monument Butte 2-2-9-16**  
**page 2**

**Oil/Gas& Other Mineral Resources Protection:** The Board of Oil, Gas & Mining approved the Monument Butte Unit August 14, 1987. Correlative rights issues were addressed at that time. Previous reviews in this area indicate that other mineral resources in the area have been protected or are not at issue.

**Bonding:** Bonded with the BLM.

**Actions Taken and Further Approvals Needed:** A notice of agency action has been sent to the Salt Lake Tribune and the Uinta Basin Standard. A casing/tubing pressure test will be required prior to injection. It is recommended that approval of this application be granted.

Note: Applicable technical publications concerning water resources in the general vicinity of this project have been reviewed and taken into consideration during the permit review process.

Reviewer(s): Clinton Dworshak Date 03/18/2008







**NOTICE OF  
AGENCY  
ACTION  
CAUSE NO.  
UIC 344**

BEFORE THE DIVI-  
SION OF OIL, GAS AND  
MINING  
DEPARTMENT OF  
NATURAL RESOURC-  
ES

STATE OF UTAH  
THE STATE OF UTAH  
TO ALL PERSONS IN-  
TERESTED IN THE  
ABOVE ENTITLED  
MATTER.

Notice is hereby given  
that the Division of Oil,  
Gas and Mining (the "Di-  
vision") is commencing

an informal adjudicative proceeding to consider the application of the Newfield Exploration Company for administrative approval of the Hawkeye 10-23-8-16 well, located in NW/4 SE/4 Section 23, Monument Butte Federal 14-24-8-16 well, located in SE/4 SW/4 Section 24, Monument Butte Federal 4-25-8-16 well, located in NW/4 NW/4 Section 25, Monument Butte Federal 2-25-8-16 well, located in NW/4 NE/4 Section 25, Monument Butte 16-2-9-16 well located in SE/4 SE/4 Section 2, South Wells Draw 14-2-9-16 well located SE/4 SW/4 in Section 2, Monument Butte 10-2-9-16 well located in NW/4 SE/4 Section 2, Monument Butte 6-2-9-16 well located SE/4 NW/4 in Section 2, Monument Butte 2-2-9-16 well located in NW/4 NE/4 Section 2, South Wells Draw 15-3-9-16 well located in SW/4 SE/4 Section 3, South Wells Draw 7-3-9-16 well located in SW/4 NE/4 Section 3, South Wells Draw 9-3-9-16 well located in NE/4 SE/4 Section 3, Wells Draw Federal 11-4G-9-16 well located in NW/4 NW/4 Section 4, Wells Draw 6-4G-9-16 well located in SE/4 NW/4 Section 4, Jonah Federal 15-15-9-16 well located in SW/4 SE/4 Section 15, West Point Federal 5-18-9-16 well located in SW/4 NW/4 Section 18, West Point Federal 7-18-9-16 well located in SW/4 NE/4 Section 18, West Point Federal 3-18-9-16 well located in NE/4 NW/4 Section 18, Township 9 South, Range 16 East, Salt Lake Meridian, Duchesne, Utah, for conversion to Class II injection wells. These wells are located in the Hawkeye, Monument Butte, South Wells Draw, Jonah and West Point Units respectively. The adjudicative proceedings will be conducted informally according to Utah Admin. Rule R649-10, Administrative Procedures.

Selective zones in the Green River Formation will be used for water injection. The maximum requested injection pressure and rate will be determined on each individual well based on fracture gradient information submitted by Newfield Exploration Company.

Any person desiring to object to the proposed application or otherwise intervene in the proceeding, must file a written protest or notice of intervention with the Division within fifteen days following publication of this notice. The Division's Presiding Officer for the proceeding is Gil Hunt, Associate Director, at P.O. Box 145801, Salt Lake City, Utah 84114-5801, phone number (801) 538-5340. If such a protest or notice of intervention is received, a hearing will be scheduled in accordance with the aforementioned administrative procedure rule. Protestants and/or interveners should be prepared to demonstrate at the hearing how this matter affects their interests.

Dated this 21st day of March, 2008

STATE OF UTAH  
DIVISION OF OIL,  
GAS & MINING

Gil Hunt

Associate Director

Published in the Uintah  
Basin Standard March 25,  
2008.



**STATE OF UTAH**  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

**SUNDRY NOTICES AND REPORTS ON WELLS**

Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.

1. TYPE OF WELL: OIL WELL <input checked="" type="checkbox"/> GAS WELL <input type="checkbox"/> OTHER <input type="checkbox"/>		5. LEASE DESIGNATION AND SERIAL NUMBER: UTAH STATE ML-21839
2. NAME OF OPERATOR: NEWFIELD PRODUCTION COMPANY		6. IF INDIAN, ALLOTTEE OR TRIBE NAME:
3. ADDRESS OF OPERATOR: Route 3 Box 3630 CITY Myton STATE UT ZIP 84052		7. UNIT or CA AGREEMENT NAME: MON BUTTE UNIT
4. LOCATION OF WELL: FOOTAGES AT SURFACE: 660 FNL 1980 FEL		8. WELL NAME and NUMBER: MONUMENT BUTTE 2-2-9-16
OTR/OTR. SECTION. TOWNSHIP. RANGE. MERIDIAN: NWNE, 2, T9S, R16E		9. API NUMBER: 4301332314
		10. FIELD AND POOL, OR WILDCAT: MONUMENT BUTTE
		COUNTY: DUCHESNE
		STATE: UT

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
<input type="checkbox"/> NOTICE OF INTENT (Submit in Duplicate)  Approximate date work will  _____	<input type="checkbox"/> ACIDIZE	<input type="checkbox"/> DEEPEN	<input type="checkbox"/> REPERFORATE CURRENT FORMATION
	<input type="checkbox"/> ALTER CASING	<input type="checkbox"/> FRACTURE TREAT	<input type="checkbox"/> SIDETRACK TO REPAIR WELL
	<input type="checkbox"/> CASING REPAIR	<input type="checkbox"/> NEW CONSTRUCTION	<input type="checkbox"/> TEMPORARILY ABANDON
	<input type="checkbox"/> CHANGE TO PREVIOUS PLANS	<input type="checkbox"/> OPERATOR CHANGE	<input type="checkbox"/> TUBING REPAIR
	<input type="checkbox"/> CHANGE TUBING	<input type="checkbox"/> PLUG AND ABANDON	<input type="checkbox"/> VENT OR FLAIR
<input checked="" type="checkbox"/> SUBSEQUENT REPORT (Submit Original Form Only)  Date of Work Completion:  03/24/2009	<input type="checkbox"/> CHANGE WELL NAME	<input type="checkbox"/> PLUG BACK	<input type="checkbox"/> WATER DISPOSAL
	<input checked="" type="checkbox"/> CHANGE WELL STATUS	<input type="checkbox"/> PRODUCTION (START/STOP)	<input type="checkbox"/> WATER SHUT-OFF
	<input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS	<input type="checkbox"/> RECLAMATION OF WELL SITE	<input type="checkbox"/> OTHER: -
	<input checked="" type="checkbox"/> CONVERT WELL TYPE	<input type="checkbox"/> RECOMPLETE - DIFFERENT FORMATION	

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

The above listed well was converted from a producing oil well to an Injection well on 3/24/09.

On 3/25/09 Dennis Ingram with the State of Utah (DOGM) was contacted concerning the MIT on the above listed well. Permission was given at that time to perform the test on 3/26/09. On 3/26/09 the csg was pressured up to 1210 psig and charted for 30 minutes with no pressure loss. The well was not injecting during the test. The tbg pressure was 0 psig during the test. There was not a State representative available to witness the test.

API # 43-013-32314

NAME (PLEASE PRINT) <u>Callie Ross</u>	TITLE <u>Production Clerk</u>
SIGNATURE <u><i>Callie Ross</i></u>	DATE <u>03/31/2009</u>

(This space for State use only)

**RECEIVED**  
**APR 06 2009**  
DIV. OF OIL, GAS & MINING



# Mechanical Integrity Test Casing or Annulus Pressure Test

Newfield Production Company

Rt. 3 Box 3630

Myton, UT 84052

435-646-3721

Witness: Dennis Ingram Date 3/26/09 Time 9:00 am pm

Test Conducted by: Alfredo Rios

Others Present: \_\_\_\_\_

Well: 2-2-9-16

Field: Monument Butte

Well Location: NW/NE Sec. 2 T9S, R16E  
Duchesne County, Utah

API No: 43-013-32314

<u>Time</u>	<u>Casing Pressure</u>	
0 min	<u>1210</u>	psig
5	<u>1210</u>	psig
10	<u>1210</u>	psig
15	<u>1210</u>	psig
20	<u>1210</u>	psig
25	<u>1210</u>	psig
30 min	<u>1210</u>	psig
35	_____	psig
40	_____	psig
45	_____	psig
50	_____	psig
55	_____	psig
60 min	_____	psig

Tubing pressure: Ø psig

Result:

Pass

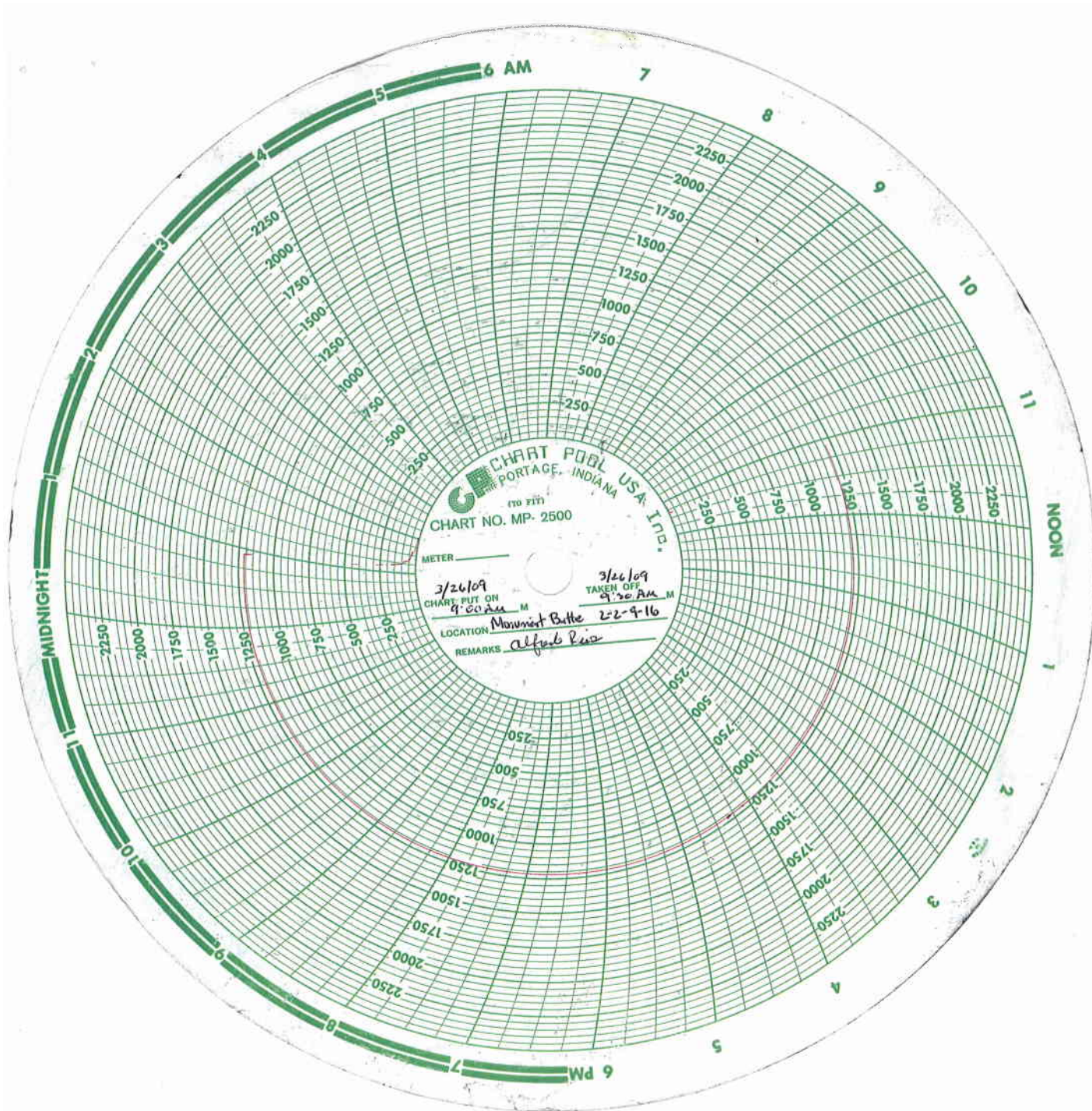
Fail

Signature of Witness: \_\_\_\_\_

Signature of Person Conducting Test: \_\_\_\_\_

Alfredo Rios







**MON BT 2-2-9-16**  
**1/1/2009 To 5/30/2009**

**3/20/2009 Day: 1****Conversion**

Nabors #1111 on 3/19/2009 - MIRU Nabors #1111. RD pumping unit. Hot oiler had pumped 60 BW down csg @ 250°. Unseat rod pump. Flush tbg & rods w/ 30 BW @ 250°. Soft seat rods & rod pump. Pressure test tbg to 3000 psi. LD 42- 3/4" guided rods. SWIFN.

---

**3/23/2009 Day: 2****Conversion**

Nabors #1111 on 3/22/2009 - LD rod string as follow: 1 1/2" X 22' polished rod, 1-4', 2' X 3/4" pony rods, 99- 3/4" guided rods, 98- 3/4" plain rods, 10-3/4" guided rods, 6- 1 1/2" weight rods, 2 1/2" X 1 1/2" X 14' RHAC rod pump. X-over for tbg. ND wellhead. NU BOPs. RU rig floor. Release TA. TOOH w/ tbg (breaking collars & applying liquid O-ring to threads) as follows: 169- jts 2 7/8" J-55 6.5# tbg, TA, 3- jts 2 7/8" J-55 tbg, SN, 2- jts 2 7/8" J-55 tbg, 2 7/8" NC. LD 38- jts not needed for injection string. SDFN.

---

**3/24/2009 Day: 3****Conversion**

Nabors #1111 on 3/23/2009 - Check pressure on well, 100 psi. PU Arrowset 1-X packer & new SN. TIH w/ 137- jts 2 7/8" 6.5# J-55 8rd EUE tbg (re-torque every break). Flush tbg w/ 30 BW @ 250°. Drop standing valve down tbg. Pressure test tbg to 3000 psi, held test for 30 min, lost 100 psi in 30 minutes. TOOH w/ 60- jts tbg. Pressure tbg to 3000 psi. SWIFN.

---

**3/25/2009 Day: 4****Conversion**

Nabors #1111 on 3/24/2009 - TOOH w/ 30- jts tbg. Pressure test tbg to 3000 psi, no test. TOOH w/ 26- jts tbg & pressure test to 3000 psi. No test. TOOH w/ 20- jts tbg & pressure test to 3000 psi. No test. TOOH w/ last jt & found standing valve to be leaking. Wait for new standing valve. Place new standing valve in SN. TIH w/ 1- jts & pressure test to 3000 psi, good test. TIH w/ 40- jts tbg, pressure test to 3000 psi, good test. TIH w/ 45- jts tbg & pressure test to 3000 psi, good test. TIH w/ 51- jts tbg & pressure test to 3000 psi, held pressure test for 30- min w/ 0 psi loss. RU sandline. RIH w/ fishing tool on sandline & retrieve standing valve. RD rig floor. ND BOPs. NU wellhead. Pump 70 bbls packer fluid down tbg-csg annulus. Set AS-1X packer w/ CE @ 4282' w/ 15,000# tension. NU wellhead. Pressure test annulus to 1400 psi. Held pressure test for 30 minutes w/ 0 psi loss. Ready for MIT!



STATE OF UTAH  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

5. LEASE DESIGNATION AND SERIAL NUMBER:  
UTAH STATE ML-21839

SUNDRY NOTICES AND REPORTS ON WELLS

6. IF INDIAN, ALLOTTEE OR TRIBE NAME:

7. UNIT or CA AGREEMENT NAME:

MON BUTTE UNIT

8. WELL NAME and NUMBER:

MONUMENT BUTTE 2-2-9-16

9. API NUMBER:

4301332314

10. FIELD AND POOL, OR WILDCAT:

MONUMENT BUTTE

1. TYPE OF WELL:

OIL WELL ☒

GAS WELL ☐

OTHER

2. NAME OF OPERATOR:

NEWFIELD PRODUCTION COMPANY

3. ADDRESS OF OPERATOR:

Route 3 Box 3630

CITY Myton

STATE UT

ZIP 84052

PHONE NUMBER

435.646.3721

4. LOCATION OF WELL:

FOOTAGES AT SURFACE: 660 FNL 1980 FEL

COUNTY: DUCHESNE

OTR/OTR. SECTION. TOWNSHIP. RANGE. MERIDIAN: NWNE, 2, T9S, R16E

STATE: UT

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
<input checked="" type="checkbox"/> NOTICE OF INTENT (Submit in Duplicate)	<input type="checkbox"/> ACIDIZE	<input type="checkbox"/> DEEPEN	<input type="checkbox"/> REPERFORATE CURRENT FORMATION
Approximate date work will	<input type="checkbox"/> ALTER CASING	<input type="checkbox"/> FRACTURE TREAT	<input type="checkbox"/> SIDETRACK TO REPAIR WELL
04/29/2009	<input type="checkbox"/> CASING REPAIR	<input type="checkbox"/> NEW CONSTRUCTION	<input type="checkbox"/> TEMPORARITLY ABANDON
	<input type="checkbox"/> CHANGE TO PREVIOUS PLANS	<input type="checkbox"/> OPERATOR CHANGE	<input type="checkbox"/> TUBING REPAIR
	<input type="checkbox"/> CHANGE TUBING	<input type="checkbox"/> PLUG AND ABANDON	<input type="checkbox"/> VENT OR FLAIR
<input type="checkbox"/> SUBSEQUENT REPORT (Submit Original Form Only)	<input type="checkbox"/> CHANGE WELL NAME	<input type="checkbox"/> PLUG BACK	<input type="checkbox"/> WATER DISPOSAL
Date of Work Completion:	<input type="checkbox"/> CHANGE WELL STATUS	<input type="checkbox"/> PRODUCTION (START/STOP)	<input type="checkbox"/> WATER SHUT-OFF
	<input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS	<input type="checkbox"/> RECLAMATION OF WELL SITE	<input checked="" type="checkbox"/> OTHER: - Change status, put well on injection.
	<input checked="" type="checkbox"/> CONVERT WELL TYPE	<input type="checkbox"/> RECOMPLETE - DIFFERENT FORMATION	

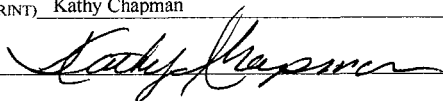
12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

The above reference well was put on injection at 3:30 PM on 4-29-09.

NAME (PLEASE PRINT) Kathy Chapman

TITLE Office Manager

SIGNATURE



DATE 04/29/2009

(This space for State use only)

RECEIVED

MAY 04 2009

DIV. OF OIL, GAS & MINING





JON M. HUNTSMAN, JR.  
Governor

GARY R. HERBERT  
Lieutenant Governor

# State of Utah

## DEPARTMENT OF NATURAL RESOURCES

MICHAEL R. STYLER  
Executive Director

### Division of Oil, Gas and Mining

JOHN R. BAZA  
Division Director

## UNDERGROUND INJECTION CONTROL PERMIT

Cause No. UIC-344

**Operator:** Newfield Production Company  
**Well:** Monument Butte 2-2-9-16  
**Location:** Section 2, Township 9 South, Range 16 East  
**County:** Duchesne  
**API No.:** 43-013-32314  
**Well Type:** Enhanced Recovery (waterflood)

### Stipulations of Permit Approval

1. Approval for conversion to Injection Well issued on April 21, 2008.
2. Maximum Allowable Injection Pressure: 2,000 psig
3. Maximum Allowable Injection Rate: (restricted by pressure limitation)
4. Injection Interval: Green River Formation (4,400' - 6,098')

Approved by:

  
Gil Hunt  
Associate Director

04-09-09  
Date

GLH/MLR/js

cc: Bruce Suchomel, Environmental Protection Agency  
Bureau of Land Management, Vernal  
Eric Sundberg, Newfield Production Company, Denver  
Newfield Production Company, Myton  
SITLA  
Duchesne County  
Well File

N:\O&G Reviewed Docs\Chron file\UIC





**STATE OF UTAH**  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

**SUNDRY NOTICES AND REPORTS ON WELLS**

Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.

1. TYPE OF WELL: OIL WELL <input checked="" type="checkbox"/> GAS WELL <input type="checkbox"/> OTHER <u>W1</u>		5. LEASE DESIGNATION AND SERIAL NUMBER: UTAH STATE ML-21839
2. NAME OF OPERATOR: NEWFIELD PRODUCTION COMPANY		6. IF INDIAN, ALLOTTEE OR TRIBE NAME:
3. ADDRESS OF OPERATOR: Route 3 Box 3630 CITY Myton STATE UT ZIP 84052		7. UNIT or CA AGREEMENT NAME: MON BUTTE UNIT
4. LOCATION OF WELL: FOOTAGES AT SURFACE: 660 FNL 1980 FEL		8. WELL NAME and NUMBER: MONUMENT BUTTE 2-2-9-16
OTR/OTR. SECTION. TOWNSHIP. RANGE. MERIDIAN: NWNE, 2, T9S, R16E		9. API NUMBER: 4301332314
		10. FIELD AND POOL, OR WILDCAT: MONUMENT BUTTE
		COUNTY: DUCHESNE
		STATE: UT

11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
<input type="checkbox"/> NOTICE OF INTENT (Submit in Duplicate)  Approximate date work will  _____	<input type="checkbox"/> ACIDIZE	<input type="checkbox"/> DEEPEN	<input type="checkbox"/> REPERFORATE CURRENT FORMATION
	<input type="checkbox"/> ALTER CASING	<input type="checkbox"/> FRACTURE TREAT	<input type="checkbox"/> SIDETRACK TO REPAIR WELL
	<input type="checkbox"/> CASING REPAIR	<input type="checkbox"/> NEW CONSTRUCTION	<input type="checkbox"/> TEMPORARILY ABANDON
	<input type="checkbox"/> CHANGE TO PREVIOUS PLANS	<input type="checkbox"/> OPERATOR CHANGE	<input checked="" type="checkbox"/> TUBING REPAIR
	<input type="checkbox"/> CHANGE TUBING	<input type="checkbox"/> PLUG AND ABANDON	<input type="checkbox"/> VENT OR FLAIR
<input checked="" type="checkbox"/> SUBSEQUENT REPORT (Submit Original Form Only)  Date of Work Completion:  <u>10/26/2009</u>	<input type="checkbox"/> CHANGE WELL NAME	<input type="checkbox"/> PLUG BACK	<input type="checkbox"/> WATER DISPOSAL
	<input type="checkbox"/> CHANGE WELL STATUS	<input type="checkbox"/> PRODUCTION (START/STOP)	<input type="checkbox"/> WATER SHUT-OFF
	<input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS	<input type="checkbox"/> RECLAMATION OF WELL SITE	<input checked="" type="checkbox"/> OTHER: - MIT
	<input type="checkbox"/> CONVERT WELL TYPE	<input type="checkbox"/> RECOMPLETE - DIFFERENT FORMATION	

12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc.

The above subject well had workover procedures performed (tubing leak), attached is a daily status report.

On 10-25-09 Dennis Ingram with the State of Utah was contacted concerning the MIT on the above listed well. Permission was given at that time to perform the test on 10-25-09. On 10-26-09 the csg was pressured up to 1560 psig and charted for 30 minute with no pressure loss. The well was not injecting during the test. The tbq pressure was 0 psig during the test. There was not a State representative available to witness the test.

API# 43-013-32314

**Accepted by the  
Utah Division of  
Oil, Gas and Mining**

Date: 11-24-09  
By: [Signature]

**COPY SENT TO OPERATOR**

Date: 12.3.2009  
Initials: KS

NAME (PLEASE PRINT) Lucy Chavez-Naupoto

TITLE Administrative Assistant

SIGNATURE

[Signature]

DATE 11/23/2009

(This space for State use only)

**RECEIVED**

**NOV 24 2009**

DIV. OF OIL, GAS & MINING



# Mechanical Integrity Test Casing or Annulus Pressure Test

Newfield Production Company

Rt. 3 Box 3630  
Myton, UT 84052  
435-646-3721

Witness: \_\_\_\_\_ Date 10/26/09 Time 12:00 am ☒ pm

Test Conducted by: Bob Whithead

Others Present: Cole Harris

Well: Monument Butte Z-2-9-16

Field: Monument Butte

Well Location: NW/NE Sec. 2, T9S, R16E

API No: 43-013-32314

<u>Time</u>	<u>Casing Pressure</u>	
0 min	<u>1560</u>	psig
5	<u>1560</u>	psig
10	<u>1560</u>	psig
15	<u>1560</u>	psig
20	<u>1560</u>	psig
25	<u>1560</u>	psig
30 min	<u>1560</u>	psig
35	_____	psig
40	_____	psig
45	_____	psig
50	_____	psig
55	_____	psig
60 min	_____	psig

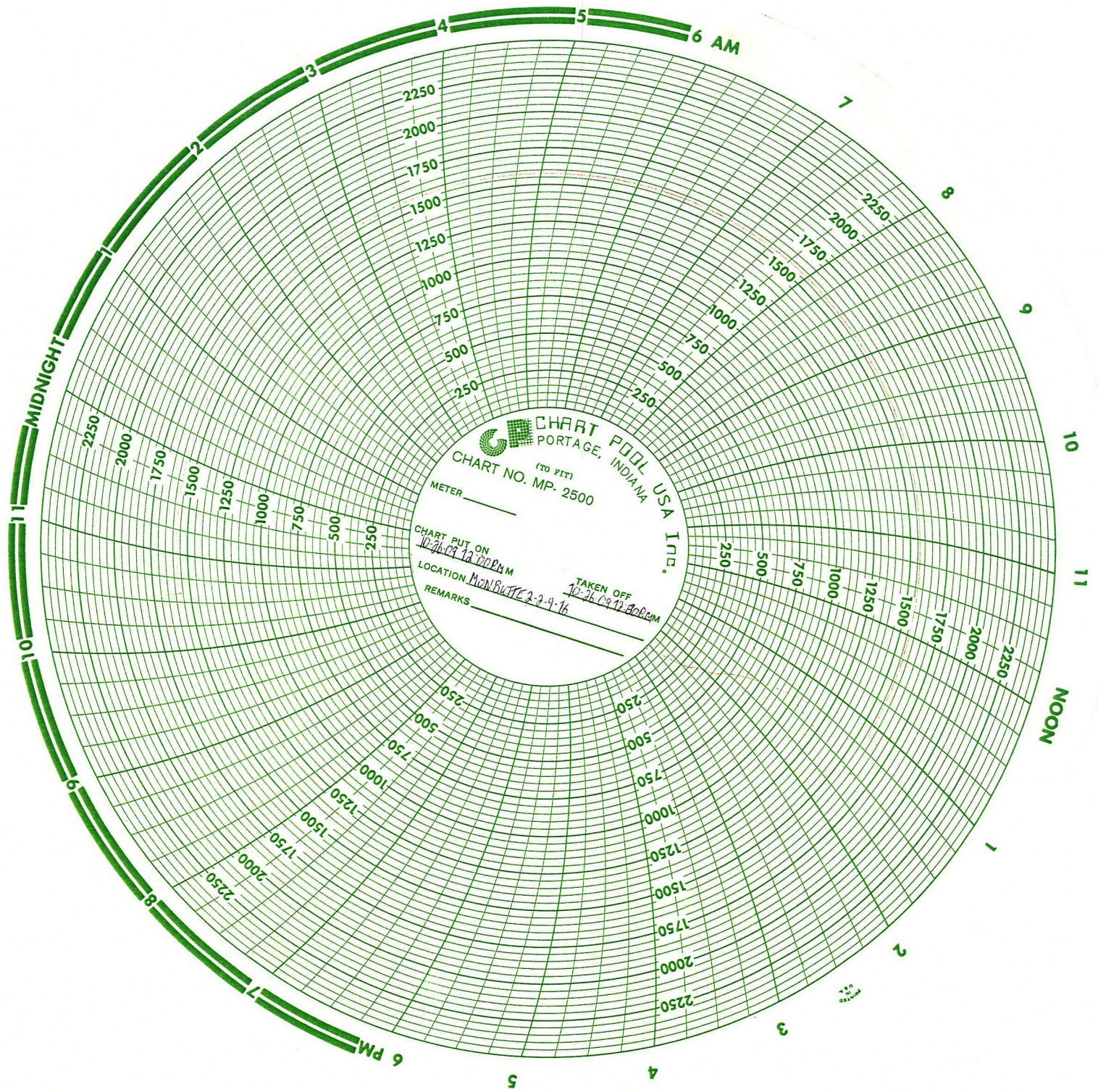
Tubing pressure: 0 psig

Result: ☒ Pass ☐ Fail

Signature of Witness: \_\_\_\_\_

Signature of Person Conducting Test: Bob Whithead







**Daily Activity Report**

Format For Sundry

**MON BT 2-2-9-16****8/1/2009 To 12/30/2009****10/21/2009 Day: 1****Tubing Leak**

WWS #1 on 10/21/2009 - Re-tested tbg. Tripped for new packer. - MIRU Western #1. Bleed well down to tank. ND wellhead & release pkr @ 4282'. NU BOP. RU HO trk & circ dn tbg W/ 30 BW @ 160°F. Drop standing valve & pump to SN. Confirmed tbg test of 3000 psi for 40 minutes. Retrieve standing valve W/ overshot on sandline. TOH W/ tbg--LD pkr (looked good). MU & TIH W/ redressed Weatherford 5 1/2" Arrowset 1-X pkr (W/ hardened steel slips & W.L. re-entry guide), new SN & 137 jts 2 7/8 8rd 6.5# J-55 tbg. Drop standing valve. RU HO trk & pump to SN. Pressure up on tbg to 3000 psi. Seems to be holding--will leave on till AM. SDFD.

**Daily Cost:** \$0**Cumulative Cost:** \$8,998

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**10/22/2009 Day: 2****Tubing Leak**

WWS #1 on 10/22/2009 - Pump packer fluids. Set & test packer. RDMOSU. - Tbg pressure @ 2800 psi. RU HO trk & bump to 3000 psi. Holds solid for 30 minutes. Retrieve standing valve W/ overshot on sandline. ND BOP & land tbg on flange. Mix 15 gals Multi-Chem C-6031 & 5 gals B-8625 in 70 bbls fresh water. Pump down annulus @ 90°F. PU on tbg & set packer W/ SN @ 4277', CE @ 4282' & EOT @ 4285'. Land tbg W/ 15,000# tension. NU wellhead. Pressure test casing & packer to 1250 psi. Holds solid for 30 minutes. Leave pressure on well. RDMOSU. Well ready for MIT.

**Daily Cost:** \$0**Cumulative Cost:** \$14,697

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**11/23/2009 Day: 3****Tubing Leak**

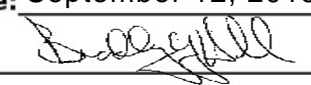
N/A# on 11/23/2009 - Workover Mit - On 10/25/09 Dennis Ingram with the State of Utah DOGM was contacted concerning the MIT on the above listed well (MON. BT 2-2-9-16). Permission was given at that time to perform the test on 10/25/09. On 10/26/09 the csg was pressured up to 1560 psig and charted for 30 minutes with no pressure loss. The well was not injecting during the test. The tbg pressure was 0 psig during the test. There was not a State representative available to witness the test. Final Report API# 43-013-32314 **Finalized**

**Daily Cost:** \$0**Cumulative Cost:** \$14,997

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**Pertinent Files: Go to File List**



<b>STATE OF UTAH</b> DEPARTMENT OF NATURAL RESOURCES DIVISION OF OIL, GAS, AND MINING		<b>FORM 9</b>
<b>SUNDRY NOTICES AND REPORTS ON WELLS</b>  Do not use this form for proposals to drill new wells, significantly deepen existing wells below current bottom-hole depth, reenter plugged wells, or to drill horizontal laterals. Use APPLICATION FOR PERMIT TO DRILL form for such proposals.		<b>5. LEASE DESIGNATION AND SERIAL NUMBER:</b> ML-21839
<b>1. TYPE OF WELL</b> Water Injection Well		<b>6. IF INDIAN, ALLOTTEE OR TRIBE NAME:</b>
<b>2. NAME OF OPERATOR:</b> NEWFIELD PRODUCTION COMPANY		<b>7. UNIT or CA AGREEMENT NAME:</b> GMBU (GRRV)
<b>3. ADDRESS OF OPERATOR:</b> Rt 3 Box 3630, Myton, UT, 84052		<b>8. WELL NAME and NUMBER:</b> MON BUTTE 2-2-9-16
<b>4. LOCATION OF WELL</b> <b>FOOTAGES AT SURFACE:</b> 0660 FNL 1980 FEL <b>QTR/QTR, SECTION, TOWNSHIP, RANGE, MERIDIAN:</b> Qtr/Qtr: NWNE Section: 02 Township: 09.0S Range: 16.0E Meridian: S		<b>9. API NUMBER:</b> 43013323140000
<b>PHONE NUMBER:</b> 435 646-4825 Ext		<b>9. FIELD and POOL or WILDCAT:</b> MONUMENT BUTTE
<b>COUNTY:</b> DUCHESNE		<b>STATE:</b> UTAH
11. CHECK APPROPRIATE BOXES TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA		
<b>TYPE OF SUBMISSION</b>	<b>TYPE OF ACTION</b>	
<input type="checkbox"/> NOTICE OF INTENT Approximate date work will start:	<input type="checkbox"/> ACIDIZE	
<input checked="" type="checkbox"/> SUBSEQUENT REPORT Date of Work Completion: 7/23/2013	<input type="checkbox"/> ALTER CASING	
<input type="checkbox"/> SPUD REPORT Date of Spud:	<input type="checkbox"/> CASING REPAIR	
<input type="checkbox"/> DRILLING REPORT Report Date:	<input type="checkbox"/> CHANGE TO PREVIOUS PLANS	
	<input type="checkbox"/> CHANGE WELL STATUS	
	<input type="checkbox"/> CHANGE WELL NAME	
	<input type="checkbox"/> COMMINGLE PRODUCING FORMATIONS	
	<input type="checkbox"/> CONVERT WELL TYPE	
	<input type="checkbox"/> DEEPEN	
	<input type="checkbox"/> FRACTURE TREAT	
	<input type="checkbox"/> NEW CONSTRUCTION	
	<input type="checkbox"/> OPERATOR CHANGE	
	<input type="checkbox"/> PLUG AND ABANDON	
	<input type="checkbox"/> PLUG BACK	
	<input type="checkbox"/> PRODUCTION START OR RESUME	
	<input type="checkbox"/> RECLAMATION OF WELL SITE	
	<input type="checkbox"/> RECOMPLETE DIFFERENT FORMATION	
	<input type="checkbox"/> REPERFORATE CURRENT FORMATION	
	<input type="checkbox"/> SIDETRACK TO REPAIR WELL	
	<input type="checkbox"/> TEMPORARY ABANDON	
	<input type="checkbox"/> TUBING REPAIR	
	<input type="checkbox"/> VENT OR FLARE	
	<input type="checkbox"/> WATER DISPOSAL	
	<input type="checkbox"/> WATER SHUTOFF	
	<input type="checkbox"/> SI TA STATUS EXTENSION	
	<input type="checkbox"/> WILDCAT WELL DETERMINATION	
	<input checked="" type="checkbox"/> OTHER	
	OTHER: Well Stimulation / Hyper Scraper	
12. DESCRIBE PROPOSED OR COMPLETED OPERATIONS. Clearly show all pertinent details including dates, depths, volumes, etc. The above subject well had workover procedures performed (Well Stimulation / Hyper Scratcher), attached is a daily status report. On 07/22/2013 Chris Jensen with the State of Utah was contacted concerning the MIT on the above listed well. On 07/23/2013 the csg was pressured up to 1330 psig and charted for 30 minutes with no pressure loss. The well was not injecting during the test. The tbp pressure was 0 psig during the test. There was a State representative available to witness the test - Chris Jensen.		
<b>NAME (PLEASE PRINT)</b> Lucy Chavez-Naupoto		<b>PHONE NUMBER</b> 435 646-4874
<b>SIGNATURE</b> N/A		<b>TITLE</b> Water Services Technician
<b>DATE</b> 7/25/2013		<b>Accepted by the Utah Division of Oil, Gas and Mining</b>  <b>Date:</b> September 12, 2013 <b>By:</b> 



# Mechanical Integrity Test Casing or Annulus Pressure Test

**Newfield Production Company****Rt. 3 Box 3630****Myton, UT 84052****435-646-3721**Witness: Chris Jensen Date 7/23/13 Time 9:05 am pmTest Conducted by: Kim Giles

Others Present: \_\_\_\_\_

Workover MITWell: Monument Butte 2-2-9-16Field: Monument ButteWell Location: NW/NE Sec. 2, T9S, R16E  
Duchesne County, UTAPI No: 43-013-32314

<u>Time</u>	<u>Casing Pressure</u>	
0 min	<u>1330</u>	psig
5	<u>1330</u>	psig
10	<u>1330</u>	psig
15	<u>1330</u>	psig
20	<u>1330</u>	psig
25	<u>1330</u>	psig
30 min	<u>1330</u>	psig
35		psig
40		psig
45		psig
50		psig
55		psig
60 min		psig

Tubing pressure: 0 psig

Result:

Pass

Fail

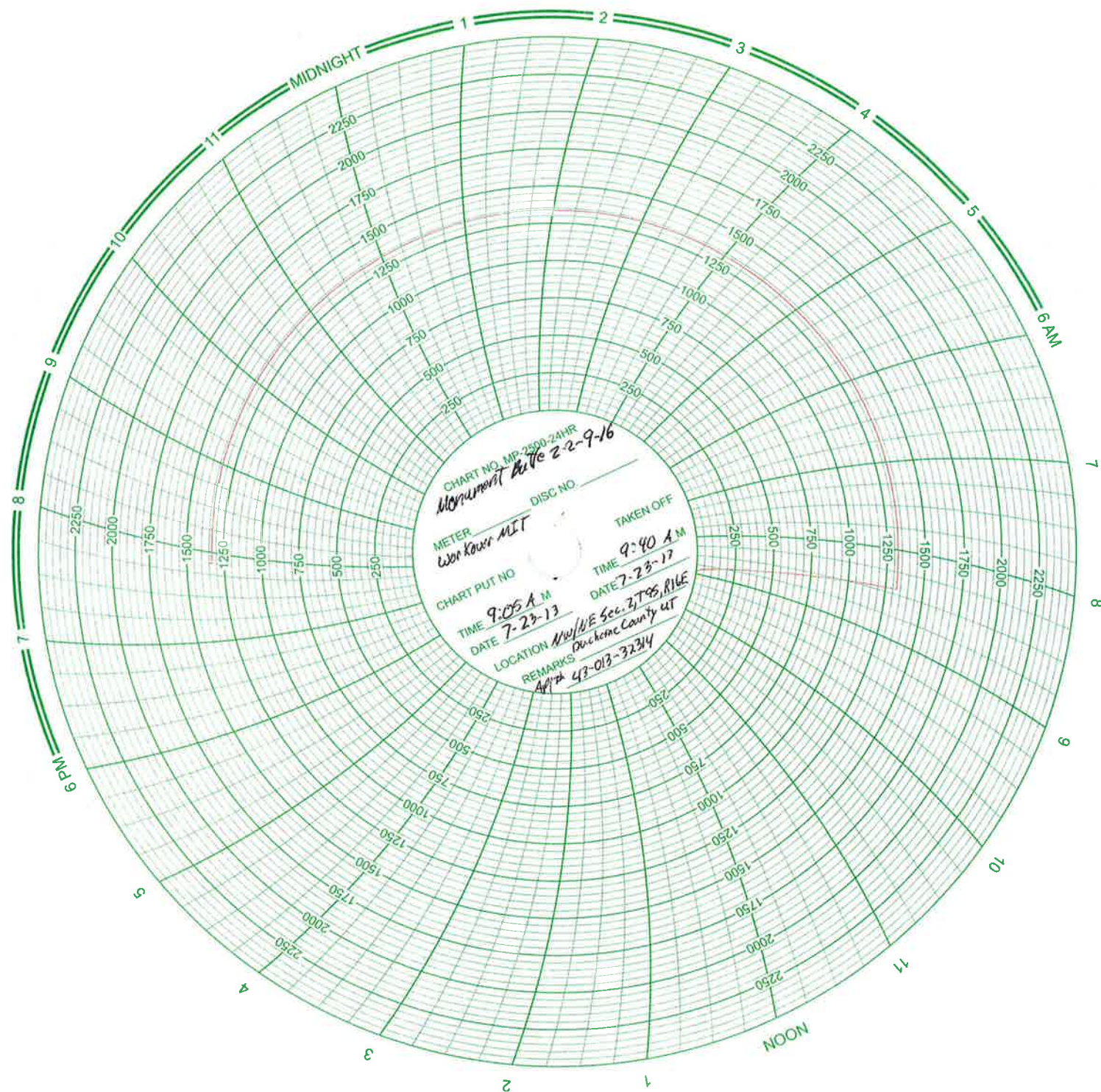
Signature of Witness:

Chris Jensen

Signature of Person Conducting Test:

Kim Giles







## Daily Activity Report

Format For Sundry

MON BT 2-2-9-16

5/1/2013 To 9/30/2013

7/22/2013 Day: 1

Well Stimulation

WWS#7 on 7/22/2013 - MIRUSU - MIRUSU, NU bops, bullhead 25 bbls down. 10 glss parafin, solvent 25 bbls fresh down tbq. Fow back well drop sv circ sv tosn w/25bbls at 1200psi. RU sanline rih and sandline ret sv POOH and rd sandline. - MIRUSU, NU bops, bullhead 25 bbls down. 10 glss parafin, solvent 25 bbls fresh down tbq. Fow back well drop sv circ sv tosn w/25bbls at 1200psi. RU sanline rih and sandline ret sv POOH and rd sandline. - SITP 1600 SICP bleed well off PU & RIH W/ 40JTS 2 7/8 j55 tbq EOT@5544 164' post bottom perf no fill LD 4 JTS TOO H W? 173 JTS 2 7/8 j55 TBG, SN, 5 1/2 AS-1x pack talled tbq on TOO H 10:45 run pump line wait for hyperscratcher 11:40 TIH w/ HS , 1 JT nipple W/ screen 171 JTS TBG MU wash standing strip washing rubber Hydro scratch perfs from 1:13 -2:30 from perfs @ 5377-5337, 5020-5028, 4859'-4870, 4559-4574, 4332-4397 starting 5' below up tp 5' above EA set TIH W/ tbq EOT @ 5411' 2:55 circ well clean W/120BBS fresh water 3:40 LD 36jts 2 7/8 j55 tbq TOO H w/67 JTS SWI, cleanup & rack out. - SITP 1600 SICP bleed well off PU & RIH W/ 40JTS 2 7/8 j55 tbq EOT@5544 164' post bottom perf no fill LD 4 JTS TOO H W? 173 JTS 2 7/8 j55 TBG, SN, 5 1/2 AS-1x pack talled tbq on TOO H 10:45 run pump line wait for hyperscratcher 11:40 TIH w/ HS , 1 JT nipple W/ screen 171 JTS TBG MU wash standing strip washing rubber Hydro scratch perfs from 1:13 -2:30 from perfs @ 5377-5337, 5020-5028, 4859'-4870, 4559-4574, 4332-4397 starting 5' below up tp 5' above EA set TIH W/ tbq EOT @ 5411' 2:55 circ well clean W/120BBS fresh water 3:40 LD 36jts 2 7/8 j55 tbq TOO H w/67 JTS SWI, cleanup & rack out. - SITP 1600 SICP bleed well off PU & RIH W/ 40JTS 2 7/8 j55 tbq EOT@5544 164' post bottom perf no fill LD 4 JTS TOO H W? 173 JTS 2 7/8 j55 TBG, SN, 5 1/2 AS-1x pack talled tbq on TOO H 10:45 run pump line wait for hyperscratcher 11:40 TIH w/ HS , 1 JT nipple W/ screen 171 JTS TBG MU wash standing strip washing rubber Hydro scratch perfs from 1:13 -2:30 from perfs @ 5377-5337, 5020-5028, 4859'-4870, 4559-4574, 4332-4397 starting 5' below up tp 5' above EA set TIH W/ tbq EOT @ 5411' 2:55 circ well clean W/120BBS fresh water 3:40 LD 36jts 2 7/8 j55 tbq TOO H w/67 JTS SWI, cleanup & rack out. - SITP 1600 SICP bleed well off PU & RIH W/ 40JTS 2 7/8 j55 tbq EOT@5544 164' post bottom perf no fill LD 4 JTS TOO H W? 173 JTS 2 7/8 j55 TBG, SN, 5 1/2 AS-1x pack talled tbq on TOO H 10:45 run pump line wait for hyperscratcher 11:40 TIH w/ HS , 1 JT nipple W/ screen 171 JTS TBG MU wash standing strip washing rubber Hydro scratch perfs from 1:13 -2:30 from perfs @ 5377-5337, 5020-5028, 4859'-4870, 4559-4574, 4332-4397 starting 5' below up tp 5' above EA set TIH W/ tbq EOT @ 5411' 2:55 circ well clean W/120BBS fresh water 3:40 LD 36jts 2 7/8 j55 tbq TOO H w/67 JTS SWI, cleanup & rack out. - MIRUSU, NU bops, bullhead 25 bbls down. 10 glss parafin, solvent 25 bbls fresh down tbq. Fow back well drop sv circ sv tosn w/25bbls at 1200psi. RU sanline rih and sandline ret sv POOH and rd sandline. - MIRUSU, NU bops, bullhead 25 bbls down. 10 glss parafin, solvent 25 bbls fresh down tbq. Fow back well drop sv circ sv tosn w/25bbls at 1200psi. RU sanline rih and sandline ret sv POOH and rd sandline. **Finalized**

**Daily Cost:** \$0

**Cumulative Cost:** \$15,418

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7/23/2013 Day: 3

Well Stimulation

WWS#7 on 7/23/2013 - SITP 150 SIWP 1550 bleed well off TOO H W/70 JTS TBG LD Hyper scratcher PU & RIH W/2 3/8 Wl entry Guide, 2 3/8 X/N W/1.875, profile , 2 3/8 TBG sub - SITP 150 SIWP 1550 bleed well off TOO H W/70 JTS TBG LD Hyper scratcher PU & RIH W/2 3/8 Wl entry Guide, 2 3/8 X/N W/1.875, profile , 2 3/8 TBG sub, 2 7/8 x2 3/8 XO 5 1/2 AS-1x packer on off tool,2 7/8 SN, 137JTS 2 7/8 J-55 TBG drop Sv Circ Sv CIRC to SN W/20BBLs



@9:50 11:00-good psi test- bleed off tbg RU& RIH W/sand line RET Sv POOH & RD sand line Mix packer fluid W/60BBLs fresh water CIRC 55 BBLs down CSG ND BOP Set packer @ 4277, XN @ 4291, EOT @ 4293 NU WH PSI test CSG to 1500 W/2 BW @1:00-2:25 lost 150 Psi Back up to 1500 psi,4:00 get good test. RD rig rack out EQ - SITP 150 SIWP 1550 bleed well off TOO H W/70 JTS TBG LD Hyper scratcher PU & RIH W/2 3/8 WI entry Guide, 2 3/8 X/N W/1.875, profile , 2 3/8 TBG sub, 2 7/8 x2 3/8 XO 5 1/2 AS-1x packer on off tool,2 7/8 SN, 137JTS 2 7/8 J-55 TBG drop Sv Circ Sv CIRC to SN W/20BBLs @9:50 11:00-good psi test- bleed off tbg RU& RIH W/sand line RET Sv POOH & RD sand line Mix packer fluid W/60BBLs fresh water CIRC 55 BBLs down CSG ND BOP Set packer @ 4277, XN @ 4291, EOT @ 4293 NU WH PSI test CSG to 1500 W/2 BW @1:00-2:25 lost 150 Psi Back up to 1500 psi,4:00 get good test. RD rig rack out EQ

**Daily Cost:** \$0

**Cumulative Cost:** \$28,848

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**7/24/2013 Day: 4****Well Stimulation**

Rigless on 7/24/2013 - Conduct MIT - On07/22/2013 Chris Jensen with the State of Utah was contacted concerning the MIT on the above listed well. On 07/23/2013 the csg was pressured up to 1330 psig and charted for 30 minutes with no pressure loss. The well was not injecting during the test. The tbg pressure was 0 psig during the test. There was a State representative available to witness the test - Chris Jensen. - On07/22/2013 Chris Jensen with the State of Utah was contacted concerning the MIT on the above listed well. On 07/23/2013 the csg was pressured up to 1330 psig and charted for 30 minutes with no pressure loss. The well was not injecting during the test. The tbg pressure was 0 psig during the test. There was a State representative available to witness the test - Chris Jensen. **Finalized**

**Daily Cost:** \$0

**Cumulative Cost:** \$29,748

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**Pertinent Files: [Go to File List](#)**



## Monument Butte 2-2-9-16

Spud Date: 08/28/2002

Put on Production: 01/21/2003

GL: 5475' KB: 5487'

Initial Production: 79 BOPD,  
311 MCFD, 5 BWPD,SURFACE CASING

CSG SIZE: 8-5/8"

GRADE: J-55

WEIGHT: 24#

LENGTH: 7 jts. (290.39')

DEPTH LANDED: 298.39' KB

HOLE SIZE: 12-1/4"

CEMENT DATA: 145 sxs Class "G" cmt, est 4 bbls cmt to surf.

PRODUCTION CASING

CSG SIZE: 5-1/2"

GRADE: J-55

WEIGHT: 15.5#

LENGTH: 143 jts. (6109.91')

DEPTH LANDED: 6107.91' KB

HOLE SIZE: 7-7/8"

CEMENT DATA: 275 sxs Prem. Lite II mixed &amp; 500 sxs 50/50 POZ.

CEMENT TOP AT: 216'

TUBING

SIZE/GRADE/WT: 2-7/8" / J-55 / 6.5#

NO. OF JOINTS: 137 jts. (4265.2')

SEATING NIPPLE: 2-7/8" (1.10')

SN LANDED AT: 4277.2' KB

ON/OFF TOOL AT: 4278.3'

ARROW #1 PACKER CE AT: 4283.4'

XO 2-3/8 x 2-7/8 J-55 AT: 4287.1'

TBG PUP 2-3/8 J-55 AT: 4287.6'

X/N NIPPLE AT: 4291.7'

TOTAL STRING LENGTH: EOT @ 4293.31'

Injection Wellbore  
Diagram

Cement top @ 216'

SN @ 4277'

On Off Tool @ 4278'

Packer @ 4283'

X/N Nipple @ 4292'

EOT @ 4293'

4332'-4338'

4349'-4351'

4369'-4372'

4393'-4397'

4559'-4566'

4570'-4574'

4859'-4864'

4867'-4870'

5020'-5028'

5322'-5337'

5377'-5380'

PBTD @ 6062'

SHOE @ 6108'

TD @ 6115'

FRAC JOB

1/16/03 5322'-5380'

**Frac A1 & A3 sands as follows:**  
88,884# 20/40 sand in 650 bbls Viking I-25 fluid. Treated @ avg press of 2243 psi w/avg rate of 24.5 BPM. ISIP- 2230 psi. Calc. Flush: 5322 gal. Actual Flush: 5250 gal

1/16/03 4859'-5028'

**Frac D1 & C sands as follows:**  
68,788# 20/40 sand in 540 bbls Viking I-25 fluid. Treated @ avg press of 2134 psi w/avg rate of 26.4 BPM. ISIP- 2200 psi. Calc flush: 4859 gal. Actual flush: 4767 gal.

1/16/03 4332'-4574'

**Frac PB10, GB6 & GB4 sands as follows:**  
65,544# 20/40 sand in 519 bbls Viking I-25 fluid. Treated @ avg press of 2094 psi w/avg rate of 24.6 BPM. ISIP 2390 psi. Calc flush: 4332 gal. Actual flush: 4242 gal.

3/24/09

**Well converted to an Injection well.**

3/31/09

**MIT completed and submitted.**

10/22/09

**Tubing Leak.** Updated rod & tubing details.

07/23/13

**Workover MIT Completed** – Well Stimulation Hyper Scratcher – update tbg detailPERFORATION RECORD

1/15/03	5322'-5337'	2 JSPF	30 holes
1/15/03	5377'-5380'	4 JSPF	12 holes
1/16/03	4859'-4864'	4 JSPF	20 holes
1/16/03	4867'-4870'	4 JSPF	12 holes
1/16/03	5020'-5028'	4 JSPF	32 holes
1/16/03	4332'-4338'	4 JSPF	24 holes
1/16/03	4349'-4351'	4 JSPF	8 holes
1/16/03	4369'-4372'	4 JSPF	12 holes
1/16/03	4393'-4397'	4 JSPF	16 holes
1/16/03	4559'-4566'	4 JSPF	28 holes
1/16/03	4570'-4574'	4 JSPF	16 holes



**Monument Butte 2-9-9-16**  
660' FNL & 1980' FEL  
NWNE Section 02-T9S-R16E  
Duchesne Co, Utah  
API #43-013-32314; Lease #ML-21839